

Florida Department of Transportation 2004-2005 Short-Range Component & Annual Performance Report



The Department's Strategic Plan for Accomplishing the Goals and
Objectives of the 2020 Florida Transportation Plan



March 2005

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OUR MISSION

The Department will provide a safe transportation system that ensures the mobility of people and goods, enhances economic prosperity and preserves the quality of our environment and communities.



The people of DOT ... dedicated to making travel in Florida safer and more efficient.

OUR Vision

OUR Values

The fundamental principles which guide the behavior and actions of our employees and our organization.

Integrity

We are committed to honesty, loyalty and a high standard of ethical conduct.

Excellence

We achieve performance excellence through hard work, innovation, creativity and prudent risk taking.

Respect

We value diversity, talent and ideas. We believe every individual should contribute and have the opportunity to be heard.

Teamwork

We accomplish our goals by working together and relying on each other.

Executive Summary

This Short-Range Component and Annual Performance Report is prepared pursuant to section 339.155, Florida Statutes. This report is organized by the Department's strategic goals, focus areas, and associated short-range objectives.

By establishing the strategic goals, short-range objectives and strategies identified in the Short-Range Component – and by encouraging our Partners to join us in pursuing the long-range goals and objectives in the Florida Transportation Plan – the Department has taken the lead in setting the course for Florida's 21st century transportation system. The goals, associated objectives and achievements in implementing the Short-Range Component are listed below.

Goal 1 – Preserve and Manage a Safe, Efficient Transportation System

1.1 Through 2011, ensure that 80 percent of pavement on the State Highway System meets Department standards.

The Department has reconfirmed its long-standing commitment to keeping the pavement on state highways in acceptable condition. Eighty percent or more of the State Highway System met Department standards from the late 1980s through 1998. This percentage has declined since the baseline fiscal year 1995/96 but is forecast to remain slightly above the objective through FY 2008/09.

Pavement on the State Highway System is in relatively good condition, with 80 percent of the pavement currently meeting Department standards. The Department has identified sufficient funds in its work program to accommodate this objective. The 20 percent of pavement that does not meet standards means that 8,112 lane miles need resurfacing or reconstruction.

1.2 Through 2011, ensure that 90 percent of FDOT-maintained bridges meet Department standards while keeping all FDOT-maintained bridges open to the public safe.

Currently, 93.6 percent of all FDOT-maintained bridges meet Department standards. "Meets Department standards" is defined as not showing evidence of structural deterioration, not being limited by weight restrictions or not needing preventative maintenance. The bridges that do not meet the standards have been identified for repair and/or replacement. All bridges maintained by the Department which are open to the public are safe.

The Department maintains 6,381 bridges and is also responsible for inspecting and rating nearly 5,014 other bridges owned by other state and local government jurisdictions. Each bridge is inspected at least once every two years to assess bridge condition and identify which bridges need routine or periodic maintenance, rehabilitation, or replacement. Special inspections are conducted after major weather events, such as floods and hurricanes.

1.3 Through 2011, achieve 100 percent of the acceptable maintenance standard on the State Highway System.

The Department has met or exceeded the acceptable maintenance standard since 1994. This percentage is forecast to meet the objective through FY 2008/09.

Field conditions are evaluated using the Maintenance Rating Program. Each part of the highway environment is rated and the overall maintenance condition is calculated. The conditions are compared to Department standards and a composite state score is calculated. The maintenance condition rating system looks at five parts of the highway environment: roadway, traffic services, roadside, drainage, and vegetation/aesthetics.

1.4 By 2011, improve system efficiency by deploying Intelligent Transportation Systems (ITS) technology on critical state corridors.

The Florida Department of Transportation (FDOT) is actively expanding the existing ITS infrastructure as well as the deployment of new ITS infrastructure. One of the first steps in expanding ITS in Florida was the development of the *Ten-Year ITS Cost Feasible Plan (CFP)*. The *CFP* provides for the expenditure of nearly \$550 million to deploy ITS infrastructure on limited-access roadway facilities.

Existing ITS can be found in Jacksonville, Orlando, Miami-Dade County, Fort Lauderdale and the Florida Turnpike Enterprise mainline. An interim ITS is in place in Palm Beach County to facilitate the maintenance of traffic efforts associated with the widening of I-95.

1.5 By 2011, improve safety and traffic flow by reducing the number of commercial vehicle crashes on the State Highway System to or below 7.7 per 100 million vehicle miles traveled.

In 2002, there were 9,917 crashes (247 fatal crashes) on the State Highway System involving large trucks yielding a crash rate of 9.93 crashes per 100 million vehicle miles traveled. Florida has the 3rd highest number of these types of crashes. In order to reverse the trend relating to crashes involving commercial motor vehicles the Department has established this aggressive new objective and included truck travel in the Strategic Highway Safety Plan.

Vehicle crashes on highways often affect far more travelers and businesses than just those that are directly involved in the crash. It is critical that crash victims be attended to as soon as possible to reduce the possibility of deaths or serious injuries. At the same time, it is not unusual for major highways to be partially or fully closed while vehicles and debris are removed, which creates or compounds traffic congestion and causes delay.

Goal 2 – Enhance Florida’s Economic Competitiveness, Quality of Life and Transportation Safety

2.1 Through 2011, at a minimum, maintain the rate of change in person hours of delay on the Florida Intrastate Highway System (FIHS).

The amount of delay experienced by drivers on the FIHS continues to worsen and is not projected to get any better. Nearly 70 percent of the improvements needed on the FIHS by 2010 are unfunded. As a result, the person hours of delay on the FIHS may increase more rapidly than they have in the past. This increase may be reduced if the Department and its partners succeed in shifting some of the travel demand from single occupant vehicles to other alternatives.

The Department will continue to emphasize the development of the FIHS as the highway backbone of the statewide transportation system while we undertake the process of planning for a multimodal, multi-owner Strategic Intermodal System.

2.2 By 2015, allocate 75 percent of discretionary capacity funds to the SIS.

FDOT has adopted an Investment Policy that establishes the Strategic Intermodal System as the state’s highest transportation capacity investment priority. This policy direction was strengthened in 2004 when the Legislature enacted and the Governor signed Senate Bill 1456, which provided the basic framework for funding future improvements to the SIS. FDOT’s investment policy focuses state resources on the SIS and facilities of regional significance. The policy is to allocate 75 percent of discretionary capacity funds to the SIS.

“Discretionary” means that FDOT has legal discretion on how and where funds can be expended. This policy does not apply to the state’s transit programs because transit serves local and metropolitan travel, nor does it apply to the funds reserved by federal law for urbanized areas with a population greater than 200,000. To minimize disruption to projects already in the work program, FDOT plans a transition to this allocation by 2015.

2.3 Through 2011, increase transit ridership at twice the average rate of population growth.

Transit ridership has increased from 167.4 million passenger trips in 1995 to almost 208 million in 2003. This is an increase of 24 percent, or slightly faster than the 21 percent growth in population.

Since 1997, transit ridership has been generally increasing at a rate greater than that of population. With 89% of Floridians living in urban areas and 71% within the service area of a transit system, the Secretary has introduced a 3-point transit plan.

The goal of the Secretary's Transit Plan is to ensure maximum inclusion of Florida projects in federal transportation program reauthorizations and New Starts allocations.

2.4 By 2011, reduce the highway fatality rate on all public roads to or below 1.3 fatalities per 100 million vehicle miles traveled.

Highway safety experts use the number of highway fatalities per 100 million vehicle miles of travel to calculate a "fatality rate." It includes motor vehicle fatalities as well as bicyclist and pedestrian fatalities involving motor vehicles. In 2002, Florida's highway fatality rate was the sixth highest among the eleven southeastern states, higher than the five other most populous states, and higher than the nation as a whole.

In 2003, Florida's fatality rate declined to 1.71 and the national fatality rate declined to 1.48. In 2003, seven out of ten highway fatalities in Florida were car, truck, or motorcycle occupants. The rest were bicyclists, motorcyclists and pedestrians.

2.5 By 2011, reduce the highway fatality rate on the State Highway System to or below 1.5 fatalities per 100 million vehicle miles traveled.

Because the Department is responsible for the State Highway System, which includes 12,000 miles of the 117,000 miles of all public roads, the Department tracks the fatality rate for the State Highway System. The fatality rate for 2003 was 1.94.

2.6 By 2011, reduce the bicyclist fatality rate to or below 0.19 fatalities per 100,000 population.

One reason Florida's highway fatality rate is comparatively high is because we have the second highest number of bicyclist fatalities and the second highest number of pedestrian fatalities in the nation (2003 data). Florida had 95 bicyclist fatalities and 509 pedestrian fatalities on highways in 2003.

The Department has established an objective to reduce bicyclist fatalities. Because there are no available data on bicyclist exposure or usage such as miles traveled, the fatality rate is based on population. The fatality rate varied between approximately 0.65 and 0.77 fatalities per 100,000 population in the late 1990s. The fatality rate was 0.56 in 2003.

2.7 By 2011, reduce the pedestrian fatality rate to or below 2.35 fatalities per 100,000 population.

The Department has established an objective to reduce pedestrian fatalities. Because there are no available data on pedestrian exposure or usage, the fatality rate is based on population. The pedestrian fatality rate per 100,000 population has gradually decreased from almost four fatalities in 1996 to approximately 3.0 fatalities per 100,000 population in 2003.

Goal 3 – Organizational Excellence

3.1 Improve external customer satisfaction

In order to determine whether we are meeting our customers' needs the Department conducted customer satisfaction surveys in 2000 and 2002. The purpose of the surveys was to measure customer satisfaction, to make improvements in what we do and how we do it, and to address identified concerns.

Results from both surveys provided overall measures for all or most customers – residents, “well elders,” commercial drivers, government officials and visitors. Common issues appearing on most surveys included:

- Roadway signs and markings
- Construction projects
- Other roadway issues (safety, roadway condition)

3.2 Improve response to external customer issues

A web-based application called FDOTracker is now being used to track and resolve customer complaints. FDOTracker is capable of tracking telephone calls, e-mails and hard copy correspondence. It is integrated with the Department's e-mail system which enables issues to be routed to the appropriate FDOT representative/office for resolution.

The system is intended to log complaints or issues from external customers, media, elected/government officials, citizen complaints/suggestions, and hot issues. The database can tell us about areas of most interest to the public and allow us to target specific issues, reduce potential complaints before they become problems, and monitor trends and patterns.

3.3 Improve project delivery

Meeting the commitment schedules identified in the Work Program is a critical first step in project delivery. However, many factors can affect how much time is needed for, as well as the ultimate cost of, an improvement. If major conflicts were not resolved in initial planning activities, project development can take three or more years.

The Department is also sensitive to the costs and inconveniences

highway construction can cause to nearby business owners and the traveling public. In an effort to reduce or eliminate these problems, the department has instituted a variety of alternative contracting methods and is evaluating their effectiveness. Through creative contracting practices, the Department can encourage innovation on the contractor's part to complete projects earlier and with fewer delays and cost overruns.

3.4 Implement the Strategic Highway Safety Plan

Because traveling safely is the public's highest expectation of the transportation system, the Department is committed to making safety a high priority in everything it does to deliver the Work Program.

In 2002, the Department developed a Strategic Highway Safety Plan (SHSP) to provide focus and direction for safety emphasis areas that can be addressed by the Department in the next 3-5 years, supplementing the successful safety programs already being accomplished.

Part 1 of the SHSP focuses on five key emphasis areas:

1. Keep vehicles in the proper travel lane and minimize the effects of leaving the travel lanes.
2. Improve the safety of intersections.
3. Improve access management and conflict point control.
4. Improve information and decision support systems.
5. Improve pedestrian and bicycle safety.

3.5 Implement the DOT Business Model statewide

In the past year, the Department has expanded its efforts to link strategic planning, performance measures, and desired outcomes focused on creating and balancing value for all our stakeholders – customers, employees, partners, the public, and the community.

We have begun implementation of a “tiered Business Plan” to meet the sometimes conflicting and changing aims that balancing value implies. Our organizational strategies need to explicitly include all stakeholder requirements. This will help to ensure actions and plans meet differing stakeholder needs and avoid adverse impacts on any stakeholders. The first tier of the Business Plan is in place, Tier 2 is 85% in place and work will continue to create and implement the remaining tiers over the next eighteen months.

3.6 Improve the leadership effectiveness system

In order to create and sustain a high performing organization you must have good leadership. Good leaders set directions, communicate and deploy values and performance expectations, and take into account the expectation of customers and other

stakeholders. They create an environment for innovation, learning and knowledge sharing. The Department is undertaking an assessment of these areas to identify ways to improve the effectiveness of its senior leaders.

A key area is strengthening the leadership team's review of the Department's performance and feedback obtained from customer and employee surveys. These reviews can lead to the identification of areas of improvement and specific actions by the leadership team to improve the Department's performance. Results of the employee surveys, begun in 1999, have been used by the Department's Executive Board to give focus to specific actions to address concerns.

3.7 Address workforce development issues

Any organization's success depends increasingly on the knowledge, skills, innovative creativity, and motivation of its employees and partners. Valuing employees means committing to their satisfaction, development, and well-being. Increasingly, this involves more flexible, high performance work practices tailored to employees with diverse workplace and home life needs. Major challenges in valuing the Department's employees include:

- Demonstrating leaders' commitment to employees;
- Providing recognition opportunities that go beyond the normal compensation system;
- Providing opportunities for development and growth within the Department;
- Sharing the Department's knowledge so our employees can better serve our customers and contribute to achieving our objectives; and
- Creating an environment that encourages risk taking.

As the Department concludes to move toward its target of reducing its work force by 25 percent from the year 2000 level and contracting with the private sector for more of its responsibilities, it is imperative that the Department ensures the well-being, satisfaction and motivation of all employees.

Annual surveys were initiated in 1999 to measure employees' opinions on these and related issues. A small but statistically significant improvement in overall FDOT job satisfaction was reflected in the 2000 Employee survey. Survey results show areas of pay, recognition and employee involvement continue to be the greatest concern for employees.

3.8 Improve effectiveness of communication to all levels of the organization

For all the things we do within the Department, **everything we do** is dependent on communication. Communication (interpersonal skills, oral and written communication) is one of the Core Competencies for senior leaders, managers, and supervisors of the Florida Department of Transportation and each is expected to exhibit excellent communication skills. Communication with our internal and external customers is key to achieving excellence.

To reduce time wasted, damaged morale, and to improve management credibility regarding information distribution, all leaders within the Department are expected to follow the Leadership Communication Policy and Procedure.

Introduction

The 2020 Florida Transportation Plan, or 2020 FTP, is a plan for all of Florida, not just the Florida Department of Transportation. The goals and objectives in the 2020 FTP form a policy framework to guide crucial investments in Florida's 21st century transportation system. Those investments must respond to growth in a manner that strengthens our economy, provides mobility choices for all and supports our environment and communities. The Department has the lead responsibility for the FTP, but it will take collective efforts of many public and private sector partners to carry out the plan.

Our Partners

Floridians and Visitors
Local Governments
Metropolitan Planning Organizations
Native American Nations
Private Sector
Regional Planning Councils
State and Federal Agencies
Transportation Authorities

About this Short-Range Component

The Department has examined what we will do and how we will do it to work with our partners to implement the 2020 FTP. We have also examined how we can measure our performance, drawing upon measures developed with the Florida Transportation Commission and through our continuing identification of objectives and measures in implementing the Sterling Business Model.

The Florida Department of Transportation (FDOT) has established three "strategic goals" to implement the 2020 FTP. Together, they encompass the long range goals of the 2020 FTP and the strategic objectives adopted as part of implementing the Sterling model. The Department will:

1. Preserve and manage a safe, efficient transportation system.
2. Enhance Florida's economic competitiveness, quality of life and transportation safety by:
 - working with partners to provide mobility choices,
 - focusing state resources on facilities of critical statewide importance that are key to our ability to compete with other states and countries,
 - designing system improvements that are compatible with community plans,
 - strengthening partnerships and seeking earlier resolution of project development issues, and
 - working with partners to reduce transportation-related fatalities and improve transportation safety.
3. Pursue organizational excellence as we carry out our responsibilities. Our focus is on improving our performance in satisfying our customers, delivering the work program and strengthening the effectiveness of the Department.

Strategic Goals

For the Florida Department of Transportation What We Do

1. Preserve and Manage a Safe, Efficient Transportation System
2. Enhance Florida's Economic Competitiveness, Quality of Life and Transportation Safety

How We Do It

3. Organizational Excellence

Safe travel in Florida is the Department's number one priority. Because safety considerations are built into how we design and implement every transportation project, safety issues are addressed in each strategic goal.

This Short-Range Component is organized by the Department's strategic goals. There are two or more focus areas for each strategic goal; for example, the two focus areas for Strategic Goal 1 are System Preservation and System Efficiency. The following are discussed for each focus area:

- ⇒ Related 2020 FTP long range goals and objectives.
- ⇒ Short-range objectives and measures – information on the objectives and measures, if established.
- ⇒ Major issues, trends and conditions.
- ⇒ Lead programs – programs primarily responsible for the short-range objectives and strategies.
- ⇒ Strategies to achieve the goals and objectives.
- ⇒ Other measures and indicators that we use (in the Long-Range Program Plan and General Appropriations Act) to help determine how the goals and objectives in the 2020 FTP are being achieved. Data are shown for the baseline fiscal year of 1995/96 and for 2001/02 where available; otherwise, data are shown for the most appropriate and available years.

More detailed information on the relationships among 2020 FTP goals and long-range objectives, short-range objectives, focus areas, lead programs, and measures will be posted on the Office of Policy Planning website, www.dot.state.fl.us/planning.

The Department has the principal responsibility for the statewide movement of people and goods. We share responsibility with other public and private interests in addressing system safety, the preservation and operation of transportation facilities, and local and metropolitan area needs. By establishing the strategic goals, short-range objectives and strategies identified in the Short-Range Component – and by encouraging our Partners to join us in pursuing the long-range goals and objectives in the FTP – the Department has taken the lead in setting the course for Florida's 21st century transportation system.

2004/05 Strategic Goals and Short-Range Objectives

Strategic Goal 1: Preserve and Manage a Safe, Efficient Transportation System

- 1.1 Through 2011, ensure that 80 percent of pavement on the State Highway System meets Department standards.
- 1.2 Through 2011, ensure that 90 percent of FDOT-maintained bridges meet Department standards while keeping all FDOT-maintained bridges open to the public safe.
- 1.3 Through 2011, achieve 100 percent of the acceptable maintenance standard on the State Highway System.
- 1.4 By 2011, improve system efficiency by deploying Intelligent Transportation Systems (ITS) technology on critical state corridors.
- 1.5 By 2011, improve safety and traffic flow by reducing the number of commercial vehicle crashes on the State Highway System to or below 7.7 per 100 million vehicle miles traveled.

Strategic Goal 2: Enhance Florida's Economic Competitiveness, Quality of Life and Transportation Safety

- 2.1 Through 2011, at a minimum, maintain the rate of change in person hours of delay on the Florida Intrastate Highway System (FIHS).
- 2.2 By 2015, allocate 75 percent of discretionary capacity funds to the SIS.
- 2.3 Through 2011, increase transit ridership at twice the average rate of population growth.
- 2.4 By 2011, reduce the highway fatality rate on all public roads to or below 1.3 fatalities per 100 million vehicle miles traveled.
- 2.5 By 2011, reduce the highway fatality rate on the State Highway System to or below 1.5 fatalities per 100 million vehicle miles traveled.
- 2.6 By 2011, reduce the bicyclist fatality rate to or below 0.19 fatalities per 100,000 population.
- 2.7 By 2011, reduce the pedestrian fatality rate to or below 2.35 fatalities per 100,000 population.

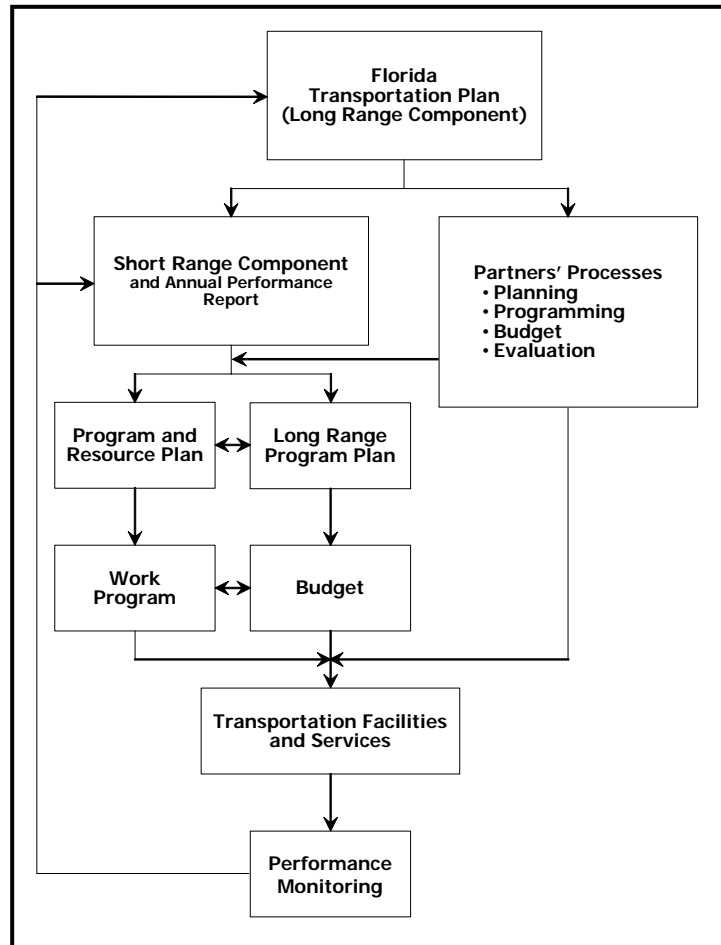
Strategic Goal 3: Organizational Excellence

- 3.1 Improve external customer satisfaction
- 3.2 Improve response to external customer issues
- 3.3 Improve project delivery
- 3.4 Implement the Strategic Highway Safety Plan
- 3.5 Implement the DOT Business Model statewide
- 3.6 Improve the leadership effectiveness system
- 3.7 Address workforce development issues
- 3.8 Improve effectiveness of communication to all levels of the organization

About Transportation Planning

Planning, building and maintaining transportation facilities is a complex process that involves many public and private stakeholders. The following are some of the key elements of that process:

- ⇒ **Florida Transportation Plan** – A comprehensive transportation plan for all of Florida. It establishes goals and objectives to be achieved over 20 years. The Florida Transportation Plan, or long-range component, is updated at least every 5 years.
- ⇒ **Short-Range Component** – An annual report that documents the strategic goals, short-range objectives and strategies necessary for the Department to work with Partners to implement the long-range goals and objectives in the FTP. It also serves as the Department's annual performance report.
- ⇒ **Program and Resource Plan** – A ten year plan that, by establishing financial and production targets for state transportation programs, guides program and funding decisions to carry out the goals and objectives of both the FTP and the Short-Range Component.
- ⇒ **Work Program** – The 5-year listing of all transportation projects planned for each fiscal year by the Department, adjusted for the legislatively approved budget for the first year.
- ⇒ **Long-Range Program Plan** – A 5-year plan developed by each state agency to achieve state goals, agency program objectives and the service outcomes from those programs. It provides the framework for developing agency budget requests and related performance measures.
- ⇒ **Legislative Budget Request** – An annual request to the Legislature or supplemental detailed requests filed with the Legislature, for the amounts of money an agency or branch of government believes will be needed to perform the functions that it is authorized, or which it is requesting authorization by law, to perform.
- ⇒ **Performance Monitoring** – Evaluation, tracking and analysis of how well the adopted work program meets the short-term objectives contained in the Short-Range Component and to guide future updates of the Florida Transportation Plan.
- ⇒ **Partners' Processes** – The Department's public and private sector partners own and operate many transportation facilities. Many of these facilities are planned and funded jointly by the Department and one or more partners, particularly those on the Strategic Intermodal System. In addition, many partners plan, fund and evaluate programs and projects for other facilities.



Strategic Goal 1: Preserve and Manage a Safe, Efficient Transportation System

Strategic Goal 1: Preserve and Manage a Safe, Efficient Transportation System

Focus Areas:

System Preservation System Efficiency

Florida has invested billions of dollars in roads, rail networks, airports, transit facilities and services, seaports and other elements of the transportation system. Regular maintenance and improvements keep these assets operating efficiently, extend their useful life and can delay the substantial cost of reconstructing or replacing them. This strategic goal addresses two focus areas: system preservation and system efficiency.

The Department will continue to make substantial investments in meeting established standards for routine maintenance and the condition of state highway pavement and bridges. Roadways owned by local governments – and other transportation facilities such as bus systems, airports, seaports and railroads that are primarily owned by local governments, public authorities and private companies – are maintained by their owners.

The Department helps fund some of these facilities, but does not directly build, operate or maintain them.

Managing the transportation system also means making sure the existing system efficiently carries more people and goods to keep up with the demand of population growth, an expanding economy, and ever-increasing travel. The Department will increase use of Intelligent Transportation Systems, demand management, access management, incident management and other techniques to maximize the operational efficiency and safety of the system.



Strategic Goal 1: Preserve and Manage a Safe, Efficient Transportation System

Focus Area: System Preservation

Short Range Objectives	1.1	Through 2011, ensure that 80 percent of pavement on the State Highway System meets Department standards.
	1.2	Through 2011, ensure that 90 percent of FDOT-maintained bridges meet Department standards while keeping all FDOT-maintained bridges open to the public safe.
	1.3	Through 2011, achieve 100 percent of the acceptable maintenance standard on the State Highway System.

The Department has primary jurisdiction over the State Highway System. Although this system consists of approximately 12,000 (10 percent) of the 117,000 public road centerline miles in the state, it carries two-thirds of the traffic. One of the Department's main responsibilities is keeping the State Highway System in acceptable physical condition. To achieve this, the Department resurfaces roads, repairs or replaces bridges and conducts routine maintenance activities such as mowing, litter removal and sign replacement.

Keeping the other facilities that are part of Florida's transportation system in acceptable physical condition is the responsibility of the local governments, authorities and private sector companies that own and operate them. The Department will continue to compile available information on condition issues for these facilities and, where authorized, make safety-related inspections.

Related 2020 FTP Goals and Objectives

Goal

Preservation and management of Florida's transportation system

Long Range Objective

Adequately maintain all elements of the transportation system to protect the public's investment for the future

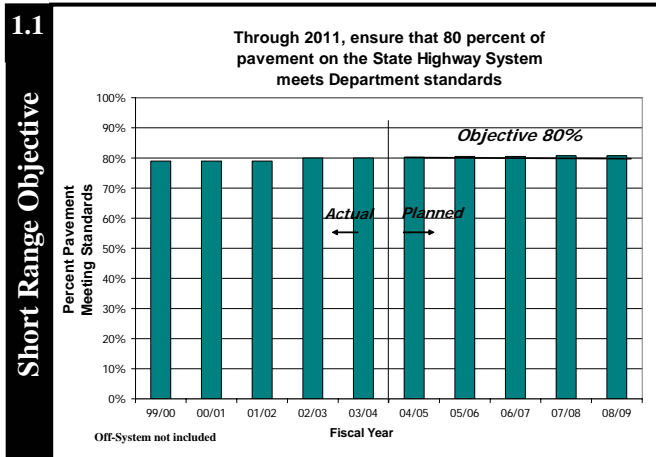
Pavement Condition

The Department has reconfirmed its long-standing commitment to keeping the pavement on state highways in acceptable condition. Eighty percent or more of the State Highway System met Department standards from the late 1980s through 1998. This percentage has declined since the baseline fiscal year 1995/96 but is forecast to remain slightly above the objective through FY 2008/09.

Lead Programs

- Resurfacing
- Motor Carrier Compliance
- Preliminary Engineering

Pavement on the State Highway System is in relatively good condition, with 80 percent of the pavement currently meeting Department standards. The Department has identified sufficient funds in its work program to accommodate this objective. The 20 percent of pavement that does not meet standards means that 8,112 lane miles need resurfacing or reconstruction.



Strategic Goal 1: Preserve and Manage a Safe, Efficient Transportation System

It is important to keep pavement in good shape. When roadway surfaces are not maintained, the roadway must be rebuilt – literally – from the ground up. It is more economical to systematically maintain roadways than to rebuild them.

Truck traffic contributes to wear on roadways, because of the force exerted on the pavement and the way pavement reacts to that force. For example, a five-axle, 80,000 pound semi-trailer truck places a load on the road equal to about 9,600 cars. The Department enforces legal weight limits because increases in weight have enormous impacts on pavement wear. Even the arrangement of truck axles or factors as simple as tire pressure can have a significant impact on pavement wear.

State roads that need resurfacing are identified through the Department's annual pavement condition survey. This survey evaluates pavement conditions using three factors: ride quality, crack severity and average depth of wheel-path ruts.

"Ride quality" is what the motorist experiences (the smoothness of the ride). It directly affects motor vehicle operating costs. Crack severity, or "cracking," refers to the structural deterioration of the pavement, which leads to loss of smoothness and deterioration of the road base by water seepage, if not corrected. Wheel-path ruts, or "rutting," are depressions in pavement caused by heavy use. These depressions can collect water, creating a safety hazard.

Strategies for Pavement Condition

The Department will help ensure the short-range objective is achieved through these actions:

- ⇒ Resurface 2,200 lane miles annually, and resurface 5.8 percent of the State Highway System annually beginning in FY 2002/03, increasing to 5.9 percent in 2005/06.
- ⇒ Reduce the percentage of commercial motor vehicles that exceed legal axle weight limits.
- ⇒ Facilitate training and technical assistance, and maintain current data systems to assist local governments in conducting pavement condition surveys and ratings.

Measures of Effectiveness	Baseline Data FY 1995/96	FY 2003/04 Data
Percent of Turnpike pavement meeting Department standards (Turnpike is 4% of SHS).	96%	89%
Percent of Interstate pavement meeting Department standards (Interstate is 18% of SHS).	87%	82%
Percent of arterials and other freeways meeting Department standards (Arterials and other freeways account for 78% of SHS).	79%	79%
Lane miles contracted for resurfacing.	1,891	1,941
Number of commercial vehicle weighings.	6.7M	20.7M
Number of portable scale weighings performed.	47,656 (1996/97)	36,138
Percent of commercial vehicles weighed that were overweight:		
• fixed scale:	0.5%	.18%
• portable scale.	34%	40%

Bridge Condition

The Department has also reconfirmed its long-standing commitment to keeping the bridges on state highways in good, safe condition. Ninety percent or more of the bridges on the State Highway System have met Department standards since the baseline fiscal year 1995/96. This percentage is forecast to meet the objective through FY 2008/09.

Lead Programs

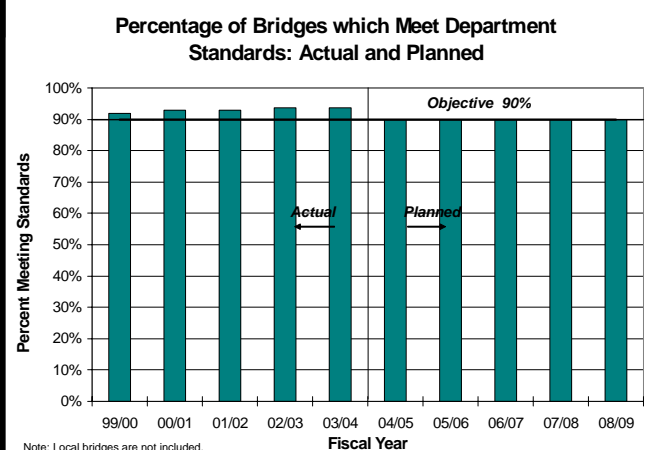
- Bridge
- Preliminary Engineering
- Routine Maintenance
- Motor Carrier Compliance

Currently, 93.6 percent of all FDOT-maintained bridges meet Department standards. “Meets Department standards” is defined as not showing evidence of structural deterioration, not being limited by weight restrictions or not needing preventative maintenance. The bridges that do not meet the standards have been identified for repair and/or replacement. All bridges maintained by the Department which are open to the public are safe.

The Department maintains 6,381 bridges and is also responsible for inspecting and rating nearly 5,014 other bridges owned by other state and local government jurisdictions. Each bridge is inspected at least once every two years to assess bridge condition and identify which bridges need routine or periodic maintenance, rehabilitation, or replacement. Special inspections are conducted after major weather events, such as floods and hurricanes.

1.2

Short Range Objective



Repairs help a bridge last longer. But, at a certain point, it becomes more cost effective to replace a structure than repair it. Since the Department’s bridge inspection program began in 1970 there has been a steady improvement in bridge condition on the State Highway System due to an aggressive maintenance and construction program. The Department also administers federal programs that help fund repairs and replacements for locally maintained bridges.

Bridges are designed to tolerate a certain amount of structural deterioration and still support legal weight loads. If a bridge is unable to support all legal loads, weight limits are posted or the bridge is closed to traffic until the deficiency can be corrected. Because bridges are actually flexible, vehicles moving across the bridge cause some vertical movement in the bridge structure. Over time, this structural flexing causes deterioration. Another reason bridges wear out is stress caused by saltwater, rain, freezing temperatures and wind. Impacts from colliding motor vehicles, barges and ships also exact their toll.

Most of the damage, though, comes simply from the bridges being used. As on roadways, heavy trucks contribute to wear-and-tear on bridges. So, like pavement, bridges must be designed to take into account how many trucks will pass over them during their design lives.

Strategic Goal 1: Preserve and Manage a Safe, Efficient Transportation System

Strategies for Bridge Condition

The Department, through bridge construction projects contained in its work program and additional bridge maintenance activities, will help ensure the short-range objective is achieved through these actions:

- ⇒ Program funds to replace or repair FDOT-maintained bridges within 12 months of deficiency identification.
- ⇒ Replace or repair all structurally deficient FDOT-maintained bridges and bridges posted for weight restriction within six years of deficiency identification.
- ⇒ Replace all other FDOT-maintained bridges designated for replacement within nine years of deficiency identification.
- ⇒ Reduce the percentage of commercial motor vehicles exceeding the legal axle weight limits.
- ⇒ Continue to monitor bridges scheduled to be replaced and make interim repairs, if necessary, to safeguard the traveling public.

Measures of Effectiveness	Baseline Data FY 1995/96	FY 2003/04 Data
Number of bridge inspections.	6,664 (1999/00)	7,213
Number of bridges let to contract for repair.	199	76
Number of bridges let to contract for replacement.	44	17

Strategic Goal 1: Preserve and Manage a Safe, Efficient Transportation System

Roadway Maintenance

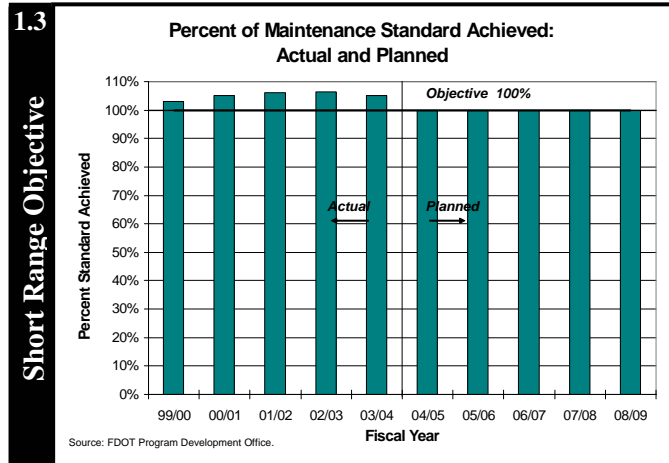
As an integral part of preserving state highways, the Department has reconfirmed its long-standing commitment to meeting its maintenance standard on state highways. The Department has met or exceeded the acceptable maintenance standard since 1994. This percentage is forecast to meet the objective through FY 2008/09.

Lead Program

- Routine Maintenance

Field conditions are evaluated using the Maintenance Rating Program. Each part of the highway environment is rated and the overall maintenance condition is calculated. The conditions are compared to Department standards and a composite state score is calculated. The maintenance condition rating system looks at five parts of the highway environment:

1. Roadway - potholes, pavement joints, paved shoulders and pavement distress;
2. Traffic services - signs, lighting, guardrails, striping, barrier walls and pavement markers;
3. Roadside - unpaved shoulders, hillside slopes, sidewalks, bike paths and fences;
4. Drainage - storm drains, ditches, roadway sweeping; and
5. Vegetation/aesthetics – landscaping, mowing, litter removal, turf condition, tree trimming.



It is important that roads be maintained at an optimal level, both for driver safety and comfort, as well as to allow the agency or local government responsible for them to plan a stable program of roadway repair or resurfacing. The Department is responsible for scheduling and performing routine maintenance on the State Highway System to help preserve its condition.

Through routine maintenance, highway rest stops are kept clean and attractive, wildflowers are planted along roadsides and potholes are filled. Department staff and contractors also mow the grass, make bridge repairs, do preventive maintenance, clean out ditches, install or replace signs and do many other jobs that are needed to make highway travel easier and safer.

Strategies for Roadway Maintenance

The Department, through projects contained in its work program and additional work efforts, will help ensure the short-range objective is achieved through these actions:

Measures of Effectiveness	Baseline Data FY1999/00	FY 2003/04 Data
Lane miles maintained on the State Highway System.	39,416	40,969

- ⇒ Continue to identify and implement practices that reduce the time and cost of preserving the State Highway System.
- ⇒ Continue to explore the use of innovative contracting methods to deliver the Roadway Maintenance program.
- ⇒ Take advantage of new technology and materials to provide better efficiency and quality.
- ⇒ Continue to monitor and adjust maintenance standards to preserve our investment and provide safe roadways for Florida motorists, including special population groups.

Strategic Goal 1: Preserve and Manage a Safe, Efficient Transportation System

Focus Area: System Efficiency

Short Range Objectives

- 1.4 By 2011, improve system efficiency by deploying Intelligent Transportation Systems (ITS) technology on critical state corridors.
- 1.5 By 2011, improve safety and traffic flow by reducing the number of commercial vehicle crashes on the State Highway System to or below 7.7 per 100 million vehicle miles traveled.

Additional short range objectives for system operations to be added in the future.

Meeting the travel demands of population growth and an expanding economy requires more than adding capacity (new travel lanes, expanded transit services, etc.) and preserving it. The transportation system must also be managed to maximize its efficiency in moving people and goods.

This can be accomplished by improving the operation of existing and new facilities, managing access to major transportation facilities so they can better serve their intended functions, and improving our responses to emergencies, crashes and other incidents.

The following discussions of these issue areas focus on strategies and the Department programs affected by the strategies, particularly where short-range objectives have not yet been established. Further analyses and data gathering are required before additional short-range objectives and measures can be established for system efficiency.

System Operations

In the last decade, the transportation industry has made great progress in using Intelligent Transportation Systems tools, or ITS, to enhance the nation's transportation systems. Many other tools are being used to improve the operation of the existing system and reduce travel demand. Development of additional short-range objectives will be coordinated with implementation of the Department's ITS Strategic Plan and our Partners, many of whom plan and implement ITS, transportation system management and demand management strategies.

Intelligent Transportation Systems

Intelligent Transportation Systems (ITS) integrate information collection, electronic communications, and other technologies to improve the efficiency and/or safety of surface transportation systems. Freeway surveillance systems, incident management systems, travel information systems, electronic payment systems, transit fleet management systems, and commercial vehicle operations are examples of ITS that are currently being deployed throughout Florida. Future ITS will include in-vehicle systems that are designed to improve the

Related 2020 FTP Goals and Objectives

Goal

Preservation and management of Florida's transportation system

Long Range Objectives

- Increase the efficiency of the transportation system using appropriate technologies
- Manage access on Florida's public roads to preserve capacity and enhance safety and mobility
- Improve incident management to minimize the impact on traffic flow

Goal

Safe transportation for residents, visitors and commerce

Long Range Objectives

- Improve the safety of commercial vehicle operations
- Minimize response times of each entity responsible for responding to crashes and other incidents
- Implement hurricane response and evacuation plans in cooperation with emergency management agencies

Lead Programs

- Intrastate Highways
- Other Arterials
- Preliminary Engineering
- Routine Maintenance
- Traffic Engineering
- Planning
- Toll Operations
- Transit
- Safety

Strategic Goal 1: Preserve and Manage a Safe, Efficient Transportation System

operational safety of vehicles by assisting the driver in performing the multitude of functions necessary to operate a vehicle.

Existing ITS can be found in Jacksonville, Orlando, Miami-Dade County, Fort Lauderdale and the Florida Turnpike Enterprise mainline. An interim ITS is in place in Palm Beach County to facilitate the maintenance of traffic efforts associated with the widening of I-95.

The Florida Department of Transportation (FDOT) is actively expanding the existing ITS infrastructure as well as the deployment of new ITS infrastructure. One of the first steps in expanding ITS in Florida was the development of the *Ten-Year ITS Cost Feasible Plan (CFP)*. The *CFP* provides for the expenditure of nearly \$550 million to deploy ITS infrastructure on limited-access roadway facilities. The \$550 million is made up of an initial allotment of \$496 million plus an additional \$30 million which became available in 2013 and another \$25 million which became available in 2014. In addition the *CFP* also provides for the deployment of advanced travel information systems (ATIS), the construction of five additional regional transportation management centers (RTMC), and the development of a statewide transportation management center software library system package.

Because of funding included in the CFP, Districts One and Seven are now actively in the design phase to implement several ITS projects that will ultimately lead to the deployment of ITS on I-75, I-275 and I-4 in Central and Southwest Florida area. These projects include not only the deployment of field devices along the limited-access facilities, but the construction of new Regional Transportation Management Centers in Ft. Myers and Tampa.

There are three regional ATISs currently operational in Florida. One is deployed in the Tri-County area of Palm Beach, Broward, and Miami-Dade, one in the Orlando area, with the third having been recently deployed in the Tampa Bay area. Multi-modal travel information is provided to the public to assist in decision-making regarding mode of travel, route and time of departure to avoid congestion. Information in the Tri-County area, as well as the Tampa Bay area, is disseminated using the Internet and the 511 abbreviated dialing code. In the Orlando area, travel information can only be accessed using the 511 abbreviated dialing code. A statewide ATIS will be deployed through the iFlorida Grant beginning in 2005 that will bring the three regional system together and provide transportation information on a statewide basis. More detailed content for Jacksonville and Southwest Florida will be provided to the statewide system to provide the same level of information in these areas as can be access in Southeast Florida, Orlando, and Tampa Bay. The statewide system will also utilize the Internet and the 511 abbreviated dialing code to disseminate travel information.

RTMCs have been established in Jacksonville, Orlando, Pompano Beach, Turkey Lake Service Plaza, Fort Lauderdale, and Miami-Dade County to operate the existing ITS infrastructure. The *CFP* provides for the construction of five additional RTMCs to operate new ITS deployments. The five new RTMCs will be constructed in Fort Myers, Sarasota, Tampa, Tallahassee, and Pensacola.

Successful ITS is contingent upon having an adequate communications system in place to communicate with field equipment and to be able to communicate between traffic management centers. The FDOT continues to be open to the development of a public-private partnership to install a statewide telecommunications plant in the FDOT's limited-access rights-of-way, to enhance communication, but has not been able to affect a successful public-private partnership to

Strategic Goal 1: Preserve and Manage a Safe, Efficient Transportation System

date. Until a public-private partnership can be developed, funding to install a telecommunications plant has been identified in the *CFP* on a project by project basis.

Operational Efficiency and Demand Management

Travel on the State Highway System in heavily congested conditions, as measured by vehicle miles traveled, increased from 20 percent in 1991 to 29 percent in 2003. During the same period, heavily congested travel on the Florida Intrastate Highway System increased from 17 percent to 20 percent. Relieving congestion with operational improvements can help improve traffic flow.

The Department routinely constructs turn lanes, revises median openings and designs, improves traffic signalization and signal systems, and makes other improvements to the operation of state highways and affected local government roads. Many of these activities take place as an added component of resurfacing state roads as part of the highway preservation program. These kinds of improvements are known as transportation system management (TSM) strategies.

Transportation demand management (TDM) strategies to reduce auto travel can help with managing the system – both by reducing the number and length of trips and by increasing vehicle occupancy. The Department works with local governments and other Partners to encourage the use of TDM techniques such as bicycle and pedestrian programs, Transportation Management Organizations, commuter computer matching and ridesharing, car pooling, park-and-ride lots, transit, commuter rail, telecommuting, alternative work hours, trip reduction ordinances, congestion pricing and other ways that reduce peak hour demand on roadways.

The development of Master Plans and Action Plans for the Florida Intrastate Highway System includes support for all modes of transit and the provision of a premium travel experience for high occupancy vehicles by incorporating special purpose lanes with exclusive connections to park and ride lots and transit services. The staged implementation of these plans is progressing consistent with the availability of funds. The Department contracts with the Florida Highway Patrol to enforce the use of high occupancy vehicle lanes, which helps maintain the integrity of the lanes and the benefits they provide.

Access Management

Comprehensive access management is a relatively new approach to addressing traffic congestion, accidents, and loss of street capacity. Access management programs address the location and design of public street and driveway connections to the roadway, as well as subdivision and site design practices. Because it involves both land use and transportation, access management also requires cooperation within and among government agencies responsible for transportation and land development decisions. The Department will work with the Department of Community Affairs to establish model development regulations serving to improve quality of life while improving transportation efficiency.

The goal of our program is to limit and separate traffic conflict points. By reducing conflict, we can increase safety and traffic operations. Florida's access management standards and regulations – developed using national standards and research undertaken or sponsored by the Department – help provide safer and more efficient travel.

Virtually all the Department's new multi-lane highway projects are designed with restrictive medians, which greatly enhance the safety of the traveling public. Because access management can

Strategic Goal 1: Preserve and Manage a Safe, Efficient Transportation System

be controversial, the Department makes a significant effort to work with the public during the planning of these projects. Each district has a team that handles access management issues at the district level. Public attendees at District Access Management Committee meetings are encouraged to complete a customer survey form. These forms indicate a very high degree of fairness and professionalism.

Strategies for Systems Operations

To help achieve the ITS short-range objective, and while the Department is developing other objectives for system operations, we will:

Measures of Effectiveness	Baseline Data FY 2000/01	FY 2003/04 Data
Projects with traffic operations provided.	42	56

- ⇒ Incorporate ITS technologies such as traffic control systems and aggressive incident management techniques to keep traffic moving on the FIHS.
- ⇒ Improve the FIHS to incorporate high-occupancy vehicle lanes and express bus transit.
- ⇒ Expand the use of the electronic toll collection system known as SunPass®.
- ⇒ Develop ITS consistent with the Ten-Year ITS Cost Feasible Plan.
- ⇒ Support commuter assistance programs providing commuter options for sharing rides to work.
- ⇒ Ensure appropriate facilities for pedestrians, bicyclists, and buses are included in highway improvement projects, and work with communities on promotional and educational events to encourage the use of bicycles.
- ⇒ Continue the Department's Access Management Program.
- ⇒ Retrofit or eliminate at least 10 centerline miles of two-way left turn lanes or painted traffic separators statewide per year, targeting those with the highest potential for safety benefits.
- ⇒ Eliminate or retrofit median openings, targeting those closest to intersections and others with the highest potential for safety benefits, through specific access management projects or as part of Resurfacing, Restoration and Rehabilitation (RRR) projects.
- ⇒ Train additional Department and local government engineers, planners, and others making access management decisions on the safety benefits of access management and the proper use of two-way left turn lanes.
- ⇒ Provide technical and financial assistance to transit agencies implementing Advance Public Transit Systems (APTS).

Incident and Emergency Management

Commercial vehicles are large trucks – trucks that weigh more than 10,000 pounds – and other vehicles such as interstate buses. Crashes involving commercial vehicles often have significant impacts on local or regional traffic, particularly if highways must be partially or fully closed as a result of a crash. The Department enforces Florida's weight, size, and safety laws to make the roads a safe place to operate for trucks and other vehicles. It plays a key role in working with local Incident Response Teams when highway crashes involve large trucks.

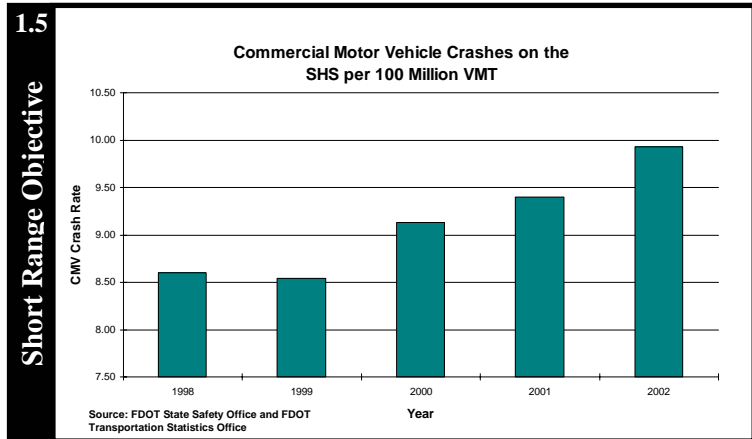
Lead Programs

- Routine Maintenance
- Traffic Engineering
- Motor Carrier Compliance
- Safety

Florida is also vulnerable to a variety of other hazards that threaten our communities, businesses, and the environment. Potential hazards include hurricanes, floods, wildfires, and acts of terrorism.

Incident Management

In 2002, there were 9,917 crashes (247 fatal crashes) on the State Highway System involving large trucks yielding a crash rate of 9.93 crashes per 100 million vehicle miles traveled. Florida has the 3rd highest number of these types of crashes. In order to reverse the trend relating to crashes involving commercial motor vehicles the Department has established this aggressive new objective and included truck travel in the Strategic Highway Safety Plan.



Vehicle crashes on highways often affect far more travelers and businesses than just those that are directly involved in the crash. It is critical that crash victims be attended to as soon as possible to reduce the possibility of deaths or serious injuries. At the same time, it is not unusual for major highways to be partially or fully closed while vehicles and debris are removed, which creates or compounds traffic congestion and causes delay for users in the vicinity of the crash. Occasionally, hazardous materials – some of which can be life-threatening – and other commodities are spilled as a result of these crashes or as a result of crashes on other transportation modes such as the railroad network. The Department is implementing a Traffic Incident Management Program. The program will improve roadway safety for both the motoring public and emergency respondents and will make travel in Florida both safer and more efficient.

Incident Response Teams have been formed in all 67 counties and many urban areas to respond rapidly to these incidents. The teams include local emergency response services (EMS), the Florida Highway Patrol and local law enforcement officers, state and local traffic engineers, state and local maintenance personnel, and the staff and resources of other Partners that may be needed. These teams work together to reduce the severity of injuries resulting from crashes and to restore transportation facilities to normal operating conditions as soon as possible. The Department is an active participant, providing traffic engineering, maintenance and Motor Carrier Compliance personnel and resources to work with other team members. A critical area of cooperation is communications.

In addition, Freeway Incident Management Teams have been formed by the Department in Miami-Dade County, Broward County, Volusia County, Jacksonville, Lake City, Palm Beach County, Tri-County (Seminole, Orange, and Osceola Counties), Marion County and Sumter County. Generally, these teams:

- Coordinate response between public agencies and private sector partners;
- Review response activities for incidents;
- Recommend improvements;
- Develop alternate routes for blocked facilities;
- Work to resolve institutional barriers; and
- Review safety at incident sites and make recommendations.

Strategic Goal 1: Preserve and Manage a Safe, Efficient Transportation System

Further, the Department is committed to expanding the service and coverage of the Road Rangers. The United States Department of Transportation estimates that service patrols (Road Rangers) can reduce delays up to 45 percent. The Road Rangers trucks continuously rove the roadway in the service area looking for stranded motorists, debris on the road, traffic accidents or other incidents. The Road Rangers assist in these situations to help motorists and ultimately to keep traffic moving. The service is free and if the repair exceeds the Road Ranger's capabilities, they will move the disabled vehicle to a safe place and have the Highway Patrol contact another towing service to assist. The other towing service is at the motorists expense.

Emergency Management

Florida has a State Emergency Response Team composed of staff from key state agencies to ensure that the state is prepared to respond to emergencies, recover from them, and mitigate their impacts. The State Emergency Operations Center provides direction and coordination of emergency response and recovery efforts before, during and after times of impending or serious emergencies or disasters. When the magnitude of the emergency or disaster exhausts local response capabilities, the Center may be activated to meet the needs.

There are three levels of activation used to express the seriousness of an event and to describe the involvement state agencies may have in emergency operations. In 2001, the State Emergency Operations Center was activated at Levels 1 or 2 – at least “partial activation” of the State Emergency Response Team – for 156 days. Of the 7,769 “incidents” recorded in 2001, the four highest types were primarily related to severe weather, petroleum spills, hazardous materials, and wastewater. Two percent of the incidents (132) were primarily related to transportation.

Strategies for Incident and Emergency Management

To help achieve the short range objective for incident management, and while the Department considers the establishment of a short range objective for emergency management, we will:

Measures of Effectiveness	Baseline Data FY 1995/96	FY 2003/04 Data
Number of commercial motor vehicle safety inspection performed	72,136	82,970

- ⇒ Improve commercial motor vehicle safety by conducting safety inspections and enforcement of safety requirements for commercial vehicles; install inspection pits at weigh stations; and improve the out-of-service verification program.
- ⇒ Implement an enforcement program for holidays to create voluntary compliance through visibility and stringent enforcement.
- ⇒ Use information from post-crash inspections of fatal crashes involving commercial vehicles to target resources in high crash locations and to identify problem carriers.
- ⇒ Participate in public information safety programs targeted to both the general public and the industry.
- ⇒ Support the AASHTO Anti-Terrorism Taskforce and the Florida Regional Domestic Security task forces.
- ⇒ Coordinate with the Florida Highway Patrol, Florida Department of Law Enforcement, and the Florida Division of Emergency Management in revising the regional evacuation plans.
- ⇒ Develop and implement comprehensive emergency management plans.

Strategic Goal 2: Enhance Florida's Economic Competitiveness, Quality of Life and Transportation Safety

Focus Areas:
Mobility/Economic Competitiveness
Quality of Life
Safety

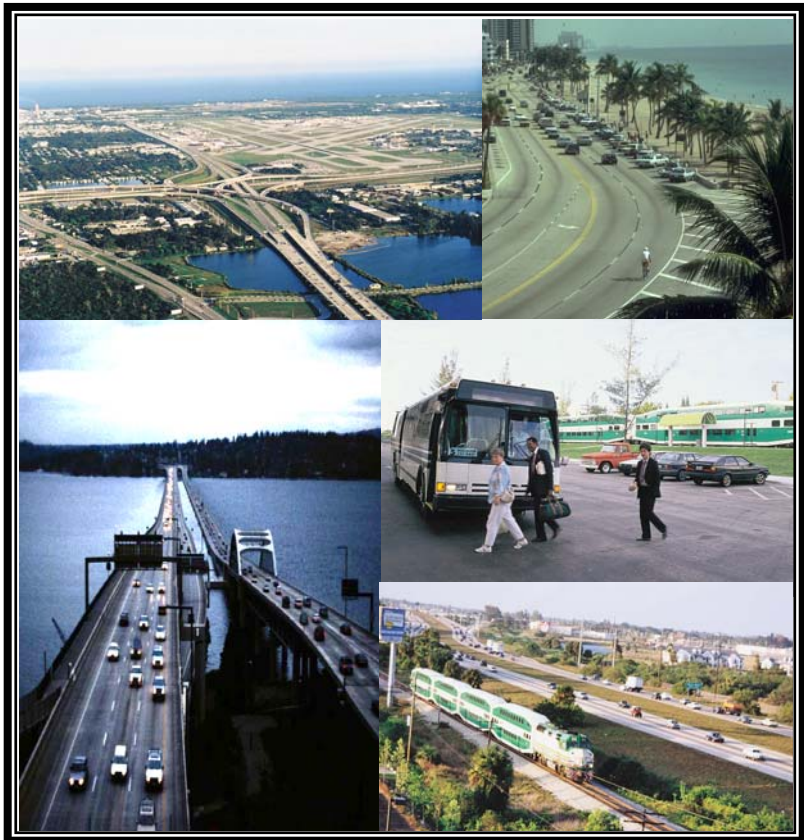
Quality of life in Florida depends upon a sound economy, livable communities, healthy ecosystems, responsible consumption of non-renewable resources and mobility options for the efficient movement of people, goods and

services. Florida's challenge is to find the appropriate balance among these important – yet often competing – expectations.

These factors attracted six million new Floridians and well over 500 million visitors in the past 20 years, making Florida the country's fifth largest economy and the fourth most populous state. Current projections indicate that during the next 20 years, Florida will have more than five million additional residents and will host over one billion visitors.

Today's transportation system has a major impact on Floridians' current quality of life. It is also the foundation for the system that will serve Floridians, visitors and commerce in 2020. The Department's role in building and operating this system varies widely. The variation in responsibilities, and the levels of resources that will be available to the Department over the next 20 years, reinforces the need for the Department to work with its Partners to enhance Floridian's quality of life.

The following discussions focus on strategies and the Department programs affected by the strategies, particularly where short-range objectives have not yet been established. Further analyses and data gathering are required before additional short-range objectives can be established for enhancing Florida's economic competitiveness and quality of life. Performance measures, where they have been identified, are shown instead. There are three focus areas discussed in this chapter: Mobility/Economic Competitiveness; Quality of Life; and Safety.



Florida's Transportation System: The Department's Role

Strategic Intermodal System (SIS)

The SIS is a statewide system of high-priority transportation facilities. It includes the state's largest and most significant commercial service airports, spaceports, deepwater seaports, freight rail terminals, passenger rail and intercity bus terminals, rail corridors, waterways and highways. These are the workhorses of Florida's transportation system. They carry more than 99 percent of all enplaned commercial air passengers in the state, virtually 100 percent of all waterborne freight tonnage, almost 100 percent of all freight moving on the rail system, and more than 68 percent of all truck traffic and 54 percent of total traffic on the State Highway System. The Department and its partners work cooperatively to operate, maintain and improve SIS facilities.

Roads and Highways

There are about 117,000 miles of public roads in Florida, the vast majority of which are owned and operated by local governments. The Department owns and operates the 12,000-mile State Highway System and is responsible for improving and preserving it.

The Florida Intrastate Highway System (FIHS) is being redefined to become essentially the highway component of the SIS. The FIHS is a statewide transportation network that provides for high-speed and high-volume traffic movements within the state. It makes up three percent of Florida's public roads, but it carries 30 percent of the traffic. It carries about 70 percent of all truck travel on the State Highway System.

Other Transportation Modes

Seaports, railroads, aviation facilities, and transit and paratransit systems are owned and operated by the private sector, local governments, or local agencies. The Department provides technical and financial assistance to the owners, and carries out state licensing and inspection requirements.

Seaports. Florida has 14 deepwater ports on the Gulf and Atlantic coasts handling two thirds of all Florida international trade. The 14 seaports generate over 3 million TEUs (20-foot equivalent container units) of cargo, or \$52 billion worth of goods. Almost 14 million cruise passenger trips occurred at Florida's seaports during 2003. The Department, working closely with the Florida Seaport Transportation and Economic Development Council (FSTED), assists the ports with on-port and off-port issues.

Rail. Florida's rail system consists of 2,871 miles of track, operated by 13 railroad companies and four terminal switching companies. This system transported about 161 million tons of cargo and 826,000 passengers in 2002. The Department's railroad responsibilities include rail safety inspections, acquisition of rail corridors, assistance in developing intercity passenger and commuter rail service, fixed guideway system development, rehabilitation of rail facilities, and rail-highway grade crossing safety improvement.

Aviation. Florida has over 836 airports, seaplane bases and heliports. Of our 131 publicly owned airports, 19 provide scheduled commercial passenger service. About 120 million passengers and 3.2 million tons of cargo passed through our airports in 2003. Florida ranks second in the nation in the total number of aircraft operations. The Department regulates and provides technical and financial assistance to aviation facilities. The Department also works with the Florida Space Authority on transportation-related issues.

Transit. Over 207 million trips were made in 2003 on Florida's 28 urban transit systems. An additional 53 million paratransit trips were made by persons who are transportation disadvantaged in 2003. The Department provides technical and operating/capital assistance to transit, paratransit, and ridesharing systems. The Department provides funds and technical assistance to 18 Regional Commuter Assistance Programs and provides grants to transit agencies to support services for WAGES participants.

Cycling and Walking. The Department develops initiatives and programs to improve the environment for safe, comfortable, and convenient walking and bicycling trips and to improve the performance and interaction among motorists, bicyclists, and pedestrians.

Focus Area: Mobility/Economic Competitiveness

Short Range Objectives

- 2.1 Through 2011, at a minimum, maintain the rate of change in person hours of delay on the Florida Intrastate Highway System (FIHS).
- 2.2 By 2015, allocate 75 percent of discretionary capacity funds to the Strategic Intermodal System (SIS).
- 2.3 Through 2011, increase transit ridership at twice the average rate of population growth.

Measures relating to economic competitiveness and mobility in non-urbanized areas are being developed.

Clearly, transportation is essential for economic activity and mobility. Commerce suffers when congestion and inadequate links between the modes of transportation create costly delays. Lower income Floridians cannot fully participate in our prosperity when a lack of transportation options isolates them from jobs and economic opportunities.

The Florida Chamber of Commerce Foundation's analysis of transportation and economic development issues led to its 1999 findings and recommendations in *Transportation Cornerstone Florida: Moving Florida's Economy into the 21st Century*, which included the following:

"Throughout its history, Florida's economy and population have been living testimony to the power of a dynamic, forward-looking transportation system ... Indeed, the high level of transportation service has been part of the 'fountain of youth' that has enabled Florida's economy to grow and thrive."

Florida's economic growth outstripped the nation as a whole in the 1990s. The Chamber Foundation's *Transportation Cornerstone* and *International Cornerstone* studies concluded that Florida is poised for continued growth in three areas:

- as a pivotal "crossroads" economy (for trade among the United States, Latin America and the Caribbean),
- as part of the next generation of global high-tech centers, and
- as one of the world's leading tourist and convention destinations.

Related 2020 FTP Goals and Objectives

Goal

A transportation system that enhances Florida's economic competitiveness

Long Range Objectives

- Establish, construct and manage Florida's Strategic Intermodal System
- Provide for smooth and efficient transfers of both passengers and freight between seaports, airports, railroads, highways and other elements of the Strategic Intermodal System
- Reduce delay for people and goods movement through increased system efficiency and multimodal capacity

Goal

A transportation system that enhances Florida's quality of life

Long Range Objectives

- Design the transportation system to support communities' visions, compatible with corridors of regional and statewide significance
- Design the transportation system to include human scale, pedestrian, bicycle, transit-oriented and other community-enhancing features, where appropriate
- Increase access to and use of alternatives to the single occupant vehicle
- Enhance the availability of transportation services to persons who are transportation disadvantaged, and ensure the efficiency, effectiveness and quality of those services

However, the *Transportation Cornerstone* also stated that the transportation system is showing “signs of falling behind the pace of economic growth and change,” and cited the following evidence that the transportation “fountain of youth” may be finally running dry:

- Over 65 percent of urban freeway miles are moderately or severely congested during peak traffic periods.
- Total vehicle-miles traveled on highways are expected to increase much faster than highway lane miles.
- About 60 percent of all airports are at or near threshold capacity.
- Virtually every major seaport and airport in Florida is grappling with inefficient highway, rail, and transit access for both goods and people.
- In most urban areas, investment in transit service has not reached the point where the transit system’s extent or convenience can compete effectively with the highway system.
- Intercity passenger rail service is limited to three Amtrak routes and Tri-County Commuter Rail.

The relationship between transportation investments and Florida’s economic competitiveness has received increased attention recently. An analysis presented to the 2003 Legislature demonstrated that investments in highway, transit, and rail over the next five years will generate 88,000 new permanent jobs over the next 25 years and each \$1 invested in those projects will generate \$5.50 in economic benefits.

Providing mobility – meeting Floridians’ need to move people and freight – is transportation’s most essential function. From a commuter’s perspective, mobility is best described in terms of the time and expenses associated with the trip to work. For transit users, it is primarily the ability to reach a destination at the desired time at a reasonable cost. For the shipper, mobility best relates to the time, cost and reliability of delivery services.

Florida’s travel corridors like the interstates and other major highways, rail lines, waterways and air routes form a connected system to move people and goods vital to Florida’s economy. Many corridors are presently overloaded and growth in resident and visitor travel and freight movement is anticipated to continue. Travel analysis leading to project development and constructed improvements has primarily focused on individual parts or segments of the statewide system. Future planning will include analysis of strategic statewide and regional travel corridors to determine project investments that contribute the most to overall corridor mobility.

FDOT has adopted an Investment Policy that establishes the Strategic Intermodal System as the state’s highest transportation capacity investment priority. It is the logical extension of policy direction given by the Governor and the Legislature over the last five years. This policy direction was strengthened in 2004 when the Legislature enacted and the Governor signed Senate Bill 1456, which provided the basic framework for funding future improvements to the SIS. FDOT’s investment policy focuses state resources on the SIS and facilities of regional significance. The policy is:

- **Allocate 75 percent of discretionary capacity funds to the SIS.** “Discretionary” means that FDOT has legal discretion on how and where funds can be expended. This policy does not apply to the state’s transit programs because transit serves local and metropolitan travel, nor does it apply to the funds reserved by federal law for urbanized areas with a population greater than 200,000. To

minimize disruption to projects already in the work program, FDOT plans a transition to this allocation by 2015.

- **Ensure a reasonable distribution of funds between the SIS and Emerging SIS and among economic regions.** Although individual SIS and Emerging SIS projects will be selected based on need, project readiness and other prioritization factors, FDOT will ensure that there is a reasonable distribution of discretionary capacity funds between SIS and Emerging SIS facilities, and among economic regions.
- **Increase the state's emphasis on regional travel.** For those facilities not on the SIS, FDOT will emphasize funding assistance for regionally significant facilities.
- **Continue the state's commitment to operate, maintain and preserve a safe State Highway System.** Owners of other systems and facilities are encouraged to operate, maintain, preserve and ensure the safety of their facilities.

Strategic Intermodal System

The 2020 FTP calls for the Department, in cooperation with its Partners, to designate a Strategic Intermodal System and adopt a strategic plan for funding and managing it.

A steering committee composed of officials from statewide private and public sector organizations made recommendations to the Secretary in 2002 for policies, funding options, prioritization methods and criteria to be used to determine what facilities and services should be designated as part of a Strategic Intermodal System (SIS). The SIS was created in 2003 legislation, which incorporated the steering committee's recommendations. The basis for funding the SIS was created in 2004 legislation.

Lead Programs

- Planning
- SIS/Intrastate Highways
- Right of Way
- Traffic Engineering
- Toll Engineering
- Toll Operations
- Aviation
- Rail
- Seaports
- Intermodal Access
- Planning

The SIS is a statewide system of high-priority transportation facilities. It includes the state's largest and most significant commercial service airports, spaceports, deepwater seaports, freight rail terminals, passenger rail and intercity bus terminals, rail corridors, waterways and highways. These facilities are the workhorses of Florida's transportation system. They carry more than 99 percent of all enplaned commercial air passengers in the state, virtually 100 percent of all waterborne freight tonnage, almost 100 percent of all freight moving on the rail system, and more than 68 percent of all truck traffic and 54 percent of total traffic on the State Highway System. With the exception of some localized commuting, recreational and shopping trips, few trips in Florida are not impacted by the SIS. Virtually every freight shipment in the state, as well as nearly every visitor and business traveler, will use the SIS at some point in its journey.

The SIS represents a fundamental shift in the way Florida develops – and makes investments in – its transportation system. The SIS will focus attention on those transportation facilities that support large numbers of international, interstate and interregional trips and give priority to transportation investments anticipated to have the greatest impact on the state's economy and quality of life. This emphasis will require a new approach to how FDOT and other partners assess the performance of the transportation system, identify potential investments and select projects for funding. In addition,

Strategic Goal 2: Economic Competitiveness, Quality of Life and Transportation Safety

the SIS is an effort to link Florida's transportation policies and investments to the state's economic development and growth management strategies. Economic diversification is a key priority of the Governor and Legislature and a key goal of Florida's Strategic Plan for Economic Development.

The SIS will be a key factor in redefining roles and responsibilities in planning and managing the transportation system. The state will take the lead in planning and managing the SIS. Strengthened regional partnerships will provide a structure for identifying and implementing regional priorities in both urban and rural areas. The SIS also will encourage a new level of partnership between the public and private sectors to plan and implement major transportation projects.

Now the Department, in cooperation with its Partners, has completed an initial SIS Strategic Plan. This Plan, adopted in December 2004, will guide future investment in and management of the SIS. This initial Plan includes a map of SIS facilities, a preliminary assessment of investment needs for maintaining and improving these facilities, a framework for setting priorities among potential improvements to the system, and a finance strategy for future investment in the SIS, including a framework for developing a 10- and 20-year cost-feasible plan.

Strategies for the Strategic Intermodal System

While the Department pursues development of a short-range objective, we will:

- ⇒ Complete development of a strategic plan for funding, managing and operating the designated Strategic Intermodal System.
- ⇒ Implement a coordinated intermodal planning approach to better support Florida's economy while continuing to identify port, airport, rail, transit and paratransit infrastructure needs.
- ⇒ Improve ground access routes to major intermodal facilities, freight distribution centers and military installations and spaceports.
- ⇒ Work with our partners to anticipate possible effects of international policies that have an impact on travel and trade, such as the North American Free Trade Agreement.
- ⇒ Transition towards an allocation of 75 percent of discretionary capacity funds to the SIS.

Florida Intrastate Highway System

The FIHS was established in 1990 by the Florida Legislature to serve high-speed and high-volume traffic movements within the state. About 66 percent of Florida's people and jobs, and 80 percent of Florida's industrial and warehousing facilities, are within five miles of the FIHS.

Lead Programs

- Intrastate Highways
- Right of Way
- Traffic Engineering
- Intermodal Access
- Toll Operations

The FIHS is the highway backbone of the SIS. The Department will continue to emphasize the development of the FIHS as the highway backbone of the multimodal, multi-owner Strategic Intermodal System. Toward that end, the Department is in the process of converting FIHS activities and financial processes to fully reflect the SIS.

In developing the FIHS, it is the policy of the Department to make capacity improvements to existing facilities where feasible to minimize cost and environmental impacts. To the maximum extent feasible, the Department ensures that proposed system projects are consistent with approved comprehensive plans of the local jurisdictions in which the facilities are to be located, and with the Transportation Improvement Program of the metropolitan planning organization in which FIHS

facilities are to be built. The Department also coordinates proposed FIHS projects with appropriate limited access projects undertaken by expressway authorities and local governmental entities.

It is obvious that congestion has been getting worse. How do we measure it? How do we measure how well a highway system is “working”? How do we assess the potential impact certain funding scenarios will have on the operation of the highway system? Traditionally, transportation agencies judged performance based upon highway “level of service,” which essentially measures how well highways accommodate vehicles, not mobility for people and goods. The Department, its partners, elected officials and citizens are seeking new ways to measure performance to help answer questions such as:

- How can we improve transportation to serve people and commerce?
- What are we getting from our investments in transportation?
- Are we investing in transportation as efficiently as possible?

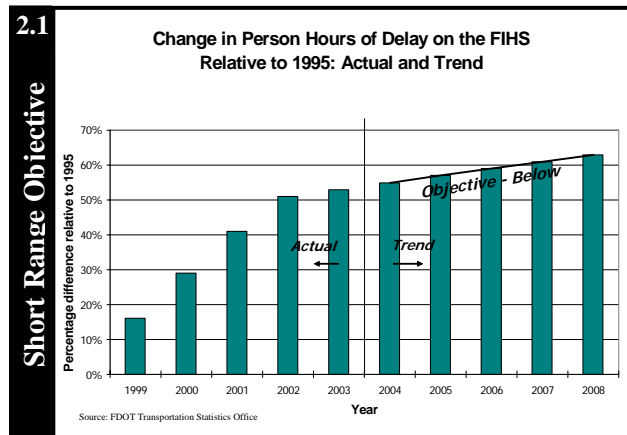
The Department has worked with national experts, Metropolitan Planning Organizations and other partners to develop some indicators of mobility performance. Initially, the indicators focus on the past and present operating condition of the FIHS. However, we intend to expand and supplement them to measure mobility on other roads and for other modes of transportation, and to estimate future mobility.

To see how well the FIHS provides its intended high-speed and high-volume traffic movement, the Department has developed some measures of mobility. There are four different dimensions of mobility, each with more than one measure:

- **Quantity of travel** – reflects the magnitude of the use of a facility or service. The measures are person miles traveled, truck miles traveled and vehicle miles traveled.
- **Quality of travel** – describes travel conditions and the effects of congestion on travelers. The measures are average speed and delay.
- **Accessibility** – describes the ease with which people can connect to the multimodal transportation system. The measures are connectivity to intermodal facilities, dwelling unit proximity, employment proximity and industrial/warehouse facility proximity.
- **Utilization** – indicates whether or not a transportation system is properly sized and has the ability to accommodate growth. The measures are percent system heavily congested, percent travel heavily congested, vehicles per lane mile and duration of congestion.

All of the measures above are important and should be examined together to get a complete picture of mobility. In order to provide a simple assessment of system performance we have chosen to concentrate on the amount of delay experienced by drivers on the FIHS.

We have established an objective to, at a minimum, maintain the rate of change in person hours of delay on the FIHS. Delay is the difference between the anticipated travel time (free flow speed) and the estimated travel time



Strategic Goal 2: Economic Competitiveness, Quality of Life and Transportation Safety

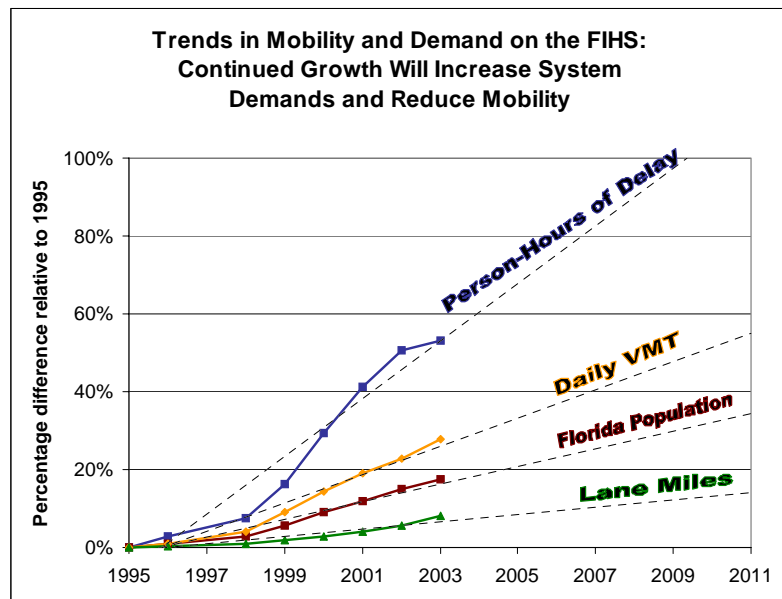
(actual average speed). Free flow speed is the posted speed plus 5 miles per hour, up to a maximum of 70 miles per hour. Actual average speed is calculated by comparing traffic volume to a road's capacity.

The accompanying table and chart show that travel grew even faster than population in the last eight years. Since 1995, the effect of these changes is that daily person hours of delay on the FIHS has increased from 92,400 to 145,800 or 5.4 percent per year. The finding that the average annual 5.4 percent growth in person hours of delay is outpacing the average annual 3.7 percent growth in vehicle miles of travel indicates that capacity expansion of the FIHS is not keeping up with travel demand.

Measure	Increase and Annual Rate: 1995-2003
Population	14.2 to 17.0 million; 2.0%
Daily Person Hours of Delay on the FIHS	94.8 to 144.6 thousand; 5.4%
Daily Vehicle Miles on the FIHS	108.6 to 145.1 million; 3.7%
Lane Miles on the FIHS	14.6 to 16.2 thousand; 1.3%

It is important to note that this measure highlights problems in urbanized areas, since that is where most of the delay occurs. However, there are clearly concerns for travel on the FIHS between the cities as well. The Department is developing a measure that assesses the travel conditions between cities.

The amount of delay experienced by drivers on the FIHS continues to worsen and is not projected to get any better. Nearly 70 percent of the improvements needed on the FIHS by 2010 are unfunded. As a result, the person hours of delay on the FIHS may increase more rapidly than they have in the past. This increase may be reduced if the Department and its partners succeed in shifting some of the travel demand from single occupant vehicles to other alternatives.



The Department realizes that additional roadways, by themselves, will not solve our congestion problems. The solution to the congestion problem is a diverse set of options that require funding commitments, as well as a variety of changes in the ways transportation systems are used. Travel choices, Intelligent Transportation Systems (ITS), and land use must be considered. The Texas Transportation Institute, however, found road expansions do at least slow the growth in congestion. In areas where capacity construction kept pace with travel growth, congestion still occurred, but only about one-third as fast in areas where construction did not keep pace with travel growth.

The Department plans to continue working with local transit authorities in Florida to collect mobility performance measures for transit systems. We have also researched and tested mobility measures for bicyclists and pedestrians. As the Department and its partners continue to refine mobility performance measures, they may form the basis of new short-range objectives in future 2020 FTP Implementation Plans. Future efforts include the following:

- Incorporation of person trip based measures,
- Development of dynamic display systems for the measures,
- Reporting of measures at the corridor level, and
- Incorporation of data and analyses from Intelligent Transportation Systems (ITS).

Strategies for the Florida Intrastate Highway System

While the Department continues to improve and develop short-range objectives for mobility and economic competitiveness, we will:

- ⇒ Continue to update on a regular basis and implement the FIHS needs and cost-feasible plans, while working with our partners to develop, multimodal FIHS corridor plans.
- ⇒ Maintain mobility on the FIHS by adding capacity, eliminating bottlenecks at interchanges/intersections, implementing traffic operations improvements, improving intermodal connections and encouraging increased use of alternatives to single-occupant vehicle travel.
- ⇒ Work with our partners to identify locations where solutions to mobility problems include alternatives to adding lanes.
- ⇒ Coordinate with our partners to consider the impact of land use decisions in the vicinity of FIHS corridors; to encourage multimodal and other corridor designations in local government comprehensive plans; to encourage the development of alternative parallel facilities; and to develop strategies to fund transportation alternatives.
- ⇒ Continue to develop a system to monitor performance of the FIHS and the delivery of the 10-year cost-feasible plan.
- ⇒ Expand the use of the electronic toll collection system known as SunPass®.
- ⇒ Improve ground access routes to major intermodal facilities, freight distribution centers consistent with the SIS Plan.

Measures of Effectiveness	Baseline Data 1995	FY 2003/04 Data
Daily person hours of delay on the FIHS	94.8	144,600
Vehicle miles traveled on the FIHS	108.6M	145.1M
Lane miles of FIHS	14,653	16,194
Number of lane miles contracted for highway capacity improvements.	317	333
Right of Way parcels acquired	3,359	1,597
Toll transactions	387.5M	680.0M
Operational cost per toll transaction	\$0.168	\$0.141
	Baseline Data 1999/00	2003/04 Data
Operational cost per dollar collected	\$0.178	\$0.17
Total budget for intrastate highway construction and arterial highway construction divided by the number of lane miles let to contract	\$4.7M	\$4.9M

- ⇒ Maximize the existing capabilities of FIHS corridors to move larger numbers of people, not just more vehicles (i.e. use medians for rail lines and HOV lanes).
- ⇒ Where practicable, require consideration of transit-friendly design elements in FIHS projects.

Transportation Choices

Transportation needs in the 21st Century cannot be met by highways alone. Highways will continue to be the mainstay of our transportation system, but limitations on the state's resources for highway expansion make it necessary to focus on additional means of travel, increase mobility for those who do not have access to automobiles, maintain air and water quality and conserve energy.

Lead Programs

- Aviation
- Transit
- Rail
- Intermodal Access
- Seaport Development
- Transportation Disadvantaged

Reducing the need to expand transportation facilities is equally important. This can be done by using our current facilities more efficiently by implementing transportation control measures, such as high occupancy vehicle (HOV) lanes and van pool programs, and to decrease the number of single occupant vehicles. We can also work toward decreasing the need for travel, through better coordination of land use and transportation decisions, and even by encouraging telecommuting.

The single occupant vehicle is the dominant means of work travel in Florida, accounting for about 94 percent of all work trips in 2001. Floridian's, like the remainder of the country, are highly reliant on the personal vehicle with very modest use of other travel means and low vehicle occupancies. Reliance on the automobile has increased traffic congestion and helped provide justification for the scope of the highway system.

The predominant development pattern in Florida has produced low-density growth. In the 1980s, seventeen of our 27 urbanized areas experienced much higher growth in their suburban and outlying areas than in their central cities. Homes can be located far from jobs and other destinations, making trips longer. This pattern of growth increases the demand for and the use of private automobiles for travel.

As of 2004, 3.9 million, or 23% of Floridians were age 60 or older. Providers of alternative modes need support to preserve today's services and to attract more riders by expanding services and improving reliability especially in urban areas and elder communities. By partnering with the Department of Elder Affairs and their *Communities For A Lifetime* initiative, elder issues such as transportation choices, accessibility, safety, and "elder-friendly" transit ridership can be addressed and improved upon. Often, these alternatives are not well developed, are not universally available, and are usually not as convenient as automobile travel.

Roads can serve more than motor vehicles, but most of them must be modified to better accommodate other means of travel. HOV lanes for carpools and public transit vehicles, and improvements for transit vehicles, bicyclists and pedestrians can create corridors for the movement of people, not just vehicles.

Regional Transportation

As Florida's economy grows, the focal point of economic activity is shifting from individual cities and towns to economic regions that encompass many cities and counties. More than 84 percent of Florida's total state population was located within urbanized areas in 2000, compared to 79 percent in 1990. Nearly one out of every five Florida workers commuted across county lines in 2000, a proportion that approached 60 percent in some suburban counties. Urbanized areas are crossing county lines, and in some cases – such as Miami-Dade, Broward and Palm Beach counties – have been merged into a single, multi-county urbanized area. The result is rising demand for interregional trips and longer-distance commuting, business, personal and freight trips within regions – even as much of the state's infrastructure development and planning processes are set up to focus on local movements within counties.

A key element of the Department's Investment Policy is increasing the Department's emphasis on regional travel. Projects on regionally-significant facilities will have a higher priority for state funding than facilities that primarily serve local travel. It is expected that Districts, MPOs and local government partners will also place high priority on some projects that, while not on regionally-significant facilities, represent sound business decisions.

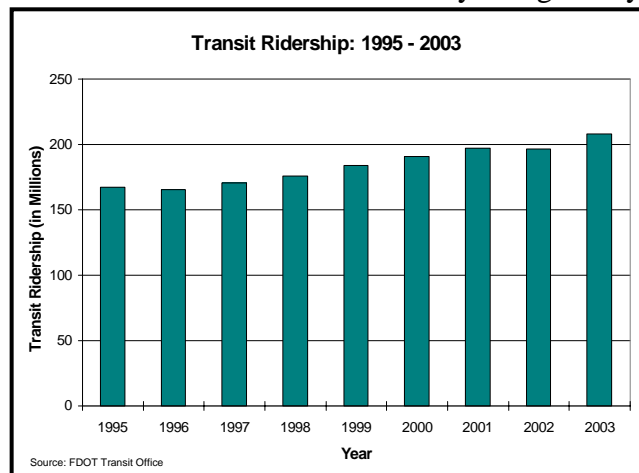
It is recognized that it will take some time for Districts, MPOs and local governments to reach agreement on which facilities are regionally significant. It is also recognized that the determination of what types of facilities are regionally significant may vary among Districts and regions. Districts will continue discussions with MPOs and local governments with the aim of reaching agreement on which facilities are regionally significant. The following is initial guidance that is being used to determine regionally significant facilities:

- Regional transportation corridors such as highway, waterway, rail, and regional transit corridors serving major regional commercial, industrial, or medical facilities;
- Regional transportation hubs such as passenger terminals (e.g., commuter rail, light rail, intercity transit, intermodal transfer centers, etc.), commercial service and major reliever airports, deepwater and special generator seaports, and major regional freight terminals and distribution centers.

All facilities on the SIS and Emerging SIS are regionally significant. Nothing contained in this guidance should be construed to automatically result in a determination that a roadway is regionally significant simply because it is a component of the state highway system. The districts will give full consideration to regionally-significant transportation facilities identified in a regional long-range transportation plan adopted by two or more contiguous metropolitan planning organizations.

Public Transit and Paratransit

Transit ridership has increased from 167.4 million passenger trips in 1995 to almost 208 million in 2003. This is an increase of 24 percent, or slightly faster than the 21 percent



Strategic Goal 2: Economic Competitiveness, Quality of Life and Transportation Safety

growth in population. However, daily vehicle miles traveled on the road network increased 29 percent.

In Florida, the average time between buses at a bus stop is 40 minutes, while buses typically operate 17 hours each day. Based on the AASHTO's *Transit Capacity and Quality of Service Manual*, these service measures provide levels of service E and D respectively (on a scale of A to F, with F being the poorest level of service).

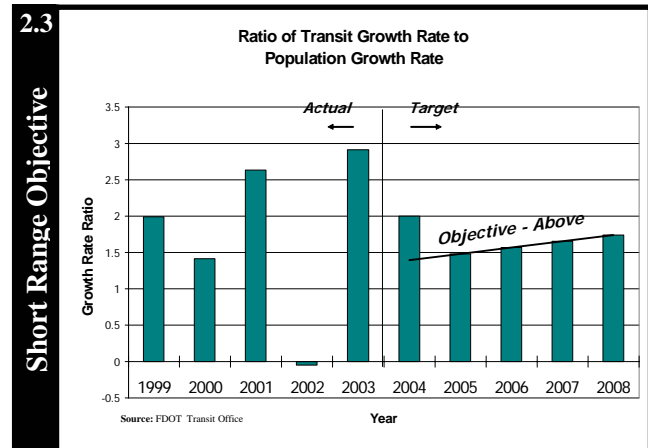
The primary sources of transit financing are local and federal. Local governments pay most transit operating expenses and the federal government pays most capital expenses. The state pays about 13 percent of operating expenses and about 10 percent of capital expenses. The Department administers federal and state transit grants, monitors compliance with transit regulations, and provides planning and technical assistance to Florida's transit agencies and communities.

Since 1997, transit ridership has been generally increasing at a rate greater than that of population. The Department has reconfirmed its commitment to assisting Partners in increasing transit ridership. With 89% of Floridians living in urban areas and 71% within the service area of a transit system, the Secretary has introduced a 3-point transit plan.

The goal of the Secretary's Transit Plan is to ensure maximum inclusion of Florida projects in federal transportation program reauthorizations and New Starts allocations. This will be achieved by focusing on:

1. Using targeted state funding as incentive for investments of compelling state interest
2. Advancing major capital projects through planning and development
3. Prioritizing projects and target federal funding

The Department assists 28 urban transit systems that receive federal and state block grants and 50 systems that serve non-urbanized areas. The Department currently funds 20 commuter assistance programs. The programs provide commuters with options for sharing rides to work rather than driving alone. In addition, the Department supports MPOs and local organizations when planning senior-friendly communities by supporting accessibility to goods and services and to develop transportation systems that are convenient and affordable for the elderly population.



Measures of Effectiveness	Baseline Data 1995	FY 2003/04 Data
Number of one-way public transit passenger trips	167.4M	196.9M
Number of one-way trips provided for transportation disadvantaged. (TDTF funded)	3.7M (1996)	6.3M
Average cost per requested one-way trip for transportation disadvantaged.	\$6.07 (1996)	\$4.94
Number of passenger enplanements.	47M	64.2M
Number of cruise embarkations and disembarkations at Florida ports.	7.1M	Est. 15.1M

The welfare to work initiative limits the amount of time a person can receive welfare and established a network of coalitions to assist them in the transition to employment. Lack of transportation to work can be one of the major obstacles. Transit systems have specific statutory responsibilities to include the coalitions in their planning. The Department has provided grants to local transit and paratransit agencies and the Commission for the Transportation Disadvantaged to support services for participants.

In 2003, an estimated 6.3 million Florida residents were considered transportation disadvantaged. This includes the elderly, children at risk, the indigent and persons with disabilities. Coordinated transportation disadvantaged systems are currently available for these residents in all 67 counties. In 2002, over 53 million trips were provided through these systems. Statewide coordination of these services is the responsibility of the Commission for the Transportation Disadvantaged.

Bicycling and Walking

Non-motorized transportation modes, such as bicycling and walking, contribute to personal mobility. In 1990, travel to work by “other means” (including bicycling, walking or working at home) accounted for less than 8 percent of work travel. The 1995 National Personal Travel Survey shows that combined average bicycling and walking rates in Southeast Florida, Orlando and Tampa Bay were only about two-thirds of the combined rates for all other large metropolitan statistical areas in the country, despite Florida’s climate and relatively flat terrain.

In a 1998 prototype survey in Miami, Orlando, Tampa and Jacksonville, the Department found that less than half of the bicycle trips reported by respondents used bike paths or bike lanes at all. Two-thirds of walking trips were made on sidewalks or dedicated footpaths. A similar survey conducted in 2002 had the same general findings.

The Department develops initiatives and programs to improve the environment for safe, comfortable, and convenient walking and bicycling trips and to improve the performance and interaction among motorists, bicyclists, and pedestrians. The Department serves as a clearinghouse for information concerning safety, design, and touring, and is also responsible for the Florida School Crossing Guard Program and the Florida Traffic and Bicycle Safety Education Program.

Measures of Effectiveness	Baseline Data 1999/00	FY 2003/04 Data
Aviation projects	277	345
Rail projects	113	93
Intermodal projects	76	65
Seaport projects*	48	13
*The Seaport Office is responsible for oversight of construction projects in the bond program as well as the traditional grant program.		

Close coordination is maintained with design staff to assure that non-motorized transportation is accommodated in design standards. New construction, restoration and rehabilitation projects in urban areas are now normally designed to include bicycle and pedestrian facilities.

Strategies for Transportation Choices

While the Department continues to develop and improve objectives for mobility, we will:

- ⇒ Implement the Strategic Intermodal System Plan.
- ⇒ Increase the state’s emphasis on regional travel.

Strategic Goal 2: Economic Competitiveness, Quality of Life and Transportation Safety

- ⇒ Implement the Department's statewide transit plan.
- ⇒ Encourage and assist local governments to provide bicyclist and pedestrian facilities which can provide transit linkages, and to facilitate the transport of bicycles on buses and trains.
- ⇒ Encouraging MPO and local government support for the Governor's *Communities For A Lifetime* initiative in planning senior friendly communities.
- ⇒ Identify high pedestrian and bicycle crash corridors and develop corrective measures in the "3-E" areas (engineering, enforcement, education).
- ⇒ Identify pedestrian/bicycle facility deficiencies (gaps) and develop projects to correct them.
- ⇒ Implement a comprehensive pedestrian and bicycle traffic safety education component in at least 3 elementary and/or middle schools per year in each district.
- ⇒ Continue to support and encourage the Commission for the Transportation Disadvantaged and local partners to continue transportation disadvantaged services and maximize limited resources.
- ⇒ Support regional commuter assistance programs.
- ⇒ Encourage the use of transportation demand management techniques such as car pooling, flexible work schedules, regional commuter assistance programs, trip reduction ordinances, congestion pricing and increased accommodations for pedestrians and bicyclists.

Focus Area: Quality of Life

Short Range Objective

Ensure that transportation investment decisions consider the impact on citizens, communities, socio-cultural resources and the environment.

Florida's quality of life is affected by many factors, some of which conflict with designing transportation systems. These factors include the livability of our communities; land use; Florida's fragile environment and the sustainability of our resources; and the mobility needs of citizens, visitors and businesses.

The key to developing an efficient transportation system where projects move forward smoothly starts with the identification and analysis of potential impacts, and the resolution of potential conflicts early in the planning and project development phases. The Department works with other state and federal agencies, Metropolitan Planning Organizations, Regional Planning Councils, governments, stakeholders and the public to address the issues that affect the human and natural environment.

Public Involvement

One of the most important ways that we can insure that issues related to transportation are effectively addressed is to encourage public input and involvement in the decision-making process. The Department has a long history of working with the public and our many partners to provide opportunities for early and meaningful participation. Active public involvement leads to transportation improvements that meet community needs and desires, provide greater acceptance of projects, and enhance agency credibility.

Districts hold numerous public meetings, develop relationships with local groups, and make presentations to local governments to explain and receive feedback about specific projects, corridor plans, the Florida Transportation Plan, work program development and other issues as they arise. For new projects, kick-off meetings are often held with local governments and other organizations. The public is provided opportunities to participate through public meetings and hearings, workshops and Web sites. The Department has published the Public Involvement Handbook and embarked on a two-year research project to assess the practice of public involvement within FDOT and the MPOs.

Related 2020 FTP Goals and Objectives

Goal

A transportation system that enhances Florida's quality of life

Long Range Objectives

- Design the transportation system to support communities' visions, compatible with corridors of regional and statewide significance
- Design the transportation system to include human scale, pedestrian, bicycle, transit-oriented and community enhancing features, where appropriate
- Design the transportation system in a way that sustains human and natural environments and conserves nonrenewable resources
- Increase access to and use of alternatives to the single-occupant vehicle
- Enhance the availability of transportation services to persons who are transportation disadvantaged, and ensure the efficiency, effectiveness and quality of those services
- Ensure that the transportation decision-making process is accessible and fair for all communities and citizens of Florida

Lead Programs

- Planning
- Environmental Management Office
- Public Transportation
- Preliminary Engineering

Broad-based public involvement should lead to more efficient use of public resources so that projects move forward with less need for re-evaluation and redesign. Our various publics should understand at what points during the transportation decision-making process they can provide input. Public involvement activities conducted early and often should assist in this process.

In summary, public involvement should be meaningful and sensitive to social and economic issues, early enough in the process to affect the outcome, often enough that participants can see how their input is considered at each step, and balanced so that decision-makers can consider needs and concerns at the federal, state, regional and local levels.

Strategies for Public Involvement

To further develop and implement effective public involvement activities, we will:

- ⇒ Continue to enhance Florida's transportation planning and programming processes, including provisions for extensive public involvement
- ⇒ Provide public involvement opportunities to all interested parties and expand the use of cost-effective techniques such as participation at partners' regularly scheduled meetings, Web sites, and ongoing relationships with groups and associations.
- ⇒ Develop methods of measuring the effectiveness of public involvement programs and processes.
- ⇒ Work with Metropolitan Planning Organizations to implement Community Impact Assessment principles and practices in the transportation planning process.
- ⇒ Develop methods to educate the public about the transportation planning process.

Transportation System Design

Designing a safe and efficient transportation system involves much more than engineering. Mobility and safety needs must be balanced with community values, land use decisions, and ecosystem management and preservation initiatives.

Lead Programs

- Planning
- Environmental Management
- Preliminary Engineering

FDOT, in partnership with the Federal Highway Administration and the Federal Transit Administration, has implemented a method for delivering transportation projects, called the Efficient Transportation Decision Making process (ETDM). The process uses Environmental Technical Advisory Teams or ETATS composed of representatives from FDOT, MPOs, and various federal and state regulatory and resource agencies to conduct environmental reviews on major capacity improvements and bridge replacements, beginning in the planning phase. Using a Web-based communications system, ETAT members can flag and comment on potential problems, so that avoidance, minimization, or mitigation alternatives can be worked out early in the transportation planning process. Through early public involvement activities, community characteristics and potential sociocultural effects are identified and measures to address those effects can be integrated into the design plans.

Projects to be reviewed through the ETDM process include proposed major capacity improvements on FDOT's Strategic Intermodal System (SIS) and State Highway System, as well as other major facility improvements in MPOs' Long Range Plans. Improvements to major facilities should incorporate context-sensitive design features when appropriate.

Balancing Livability of our Communities and Mobility

Many local governments are developing plans to promote livable neighborhoods and sustainable communities. Livability may be characterized as safe and healthy neighborhoods; sustainable employment; adequate housing, retail and community services; positive image; sense of community; walkability; and neighborhood-based cultural and recreational opportunities. Sustainability has been defined as development that meets the needs of the present without compromising the ability of future generations to meet their needs as well.

Balancing livability values with the need for higher speed interregional mobility can be a challenge. Greater emphasis is being given to the transportation decision-making process itself, especially with regard to affording access to and participation in the transportation decision making. To achieve this balance, the Department has:

- Adopted a policy on Transportation Design for Livable Communities (TDLC) to promote more balance between mobility needs and community values.
- Developed a chapter on TDLC in the Plans Preparation Manual to promote the use of more flexible design standards.
- Established the ETDM process to involve partners and identify critical issues earlier and to evaluate potential effects on the natural and human environment.
- Developed measures to track the level of satisfaction that local government officials and community partners have with the Department's efforts in obtaining their input in design and roadway projects.

Coordination of Transportation and Land Use

The relationship between land use and transportation is reciprocal: land uses create demand for transportation facilities; transportation facilities are catalysts for land development. Alternative transportation works best in areas with mixed land uses. Mobility between land uses within an urban area, and connections between communities and regions throughout the state, enhance social and economic vitality. Yet, roads constructed to link suburbs with central cities can reinforce sprawling urban development patterns. Roads constructed to connect urban areas can become the impetus for development activity along the new roads.

Florida's transportation and land use planning process has many pieces. At the state level, the Legislature adopted the State Comprehensive Plan and the Department adopted the Florida Transportation Plan. Each of the eleven Regional Planning Councils has adopted a strategic regional policy plan and each of the 25 Metropolitan Planning Organizations has adopted a long range transportation plan and an annual Transportation Improvement Program of high priority projects. At the local level, all of Florida's nearly 500 local governments have adopted a comprehensive plan. Once adopted, the local comprehensive plan has the force of law. All development, including public facilities such as state highways, must be consistent, to the maximum extent feasible, with the plan. With transportation funding decisions made largely at the state and metropolitan levels, and with land development and infrastructure decisions made almost exclusively at the local government level, coordination is critical to effective transportation and land use planning.

Strategies for Balancing Mobility and Livability in Transportation System Design

While the Department pursues the development of short-range objectives, we will:

- ⇒ Continue to work with the MPOs and federal and state resources agencies to implement the ETDM process.
- ⇒ Consider implementing livable communities features where appropriate
- ⇒ Coordinate land use and urban design in the development of transportation facilities.
- ⇒ Work with the MPOs and local governments to plan and program appropriate roadway, bicycle and pedestrian connections projects.

The Natural Environment

Florida is faced with growing and often-conflicting demands for public facilities, economic development and preservation of our natural resources. Florida is second only to Hawaii in the number of threatened or endangered plant and wildlife species. Increasing pressures on water quality and quantity, and on sensitive wetlands, present challenges to all Floridians. Some transportation projects have been significantly delayed because of environmental issues, such as encroachment on wetlands and disturbances to wildlife habitats.

The ETDM process allows the Department to coordinate with other state and federal agencies to better connect the planning, project development and permitting processes to provide earlier review with the goal of expediting environmental approvals. All state transportation projects must meet federal and state water, noise, air quality and natural resource standards. In federal fiscal year 2003/04, FDOT led the Southeastern states by mitigating 264.54 acres of wetlands which offset the 54.85 acres impacted by FDOT projects. In the past seven years, the Department has spent nearly \$10 million on special ecosystem management projects, such as wildlife crossings, impact studies, and conservation efforts.

But successful protection of and mitigation of impacts on the quality of our air, our water, our wetlands, and our endangered species calls for a more integrated flexible approach than just meeting legal standards:

- Drinking water for over 90 percent of our population is supplied by ground water sources. The Department works with the Department of Environmental Protection to reduce sediment from erosion, particularly during construction, and to reduce road-related pollutants in stormwater runoff by constructing detention and retention ponds along state highways.
- Wetlands serve as flood storage areas where water can spread out without damage to developed uplands. They filter pollutants, stabilize shorelines, produce the basic food material used by aquatic life, and serve as nursery grounds for fish and rookeries for birds. The Department provides funding for mitigation of transportation construction impacts, but the state's Water Management Districts implement the mitigation activities.
- The construction and use of some transportation projects can significantly impact wildlife habitats, including those of endangered species. Where impacts cannot be avoided or minimized, mitigation or conservation efforts are required. Informational signing and reducing speed limits to provide safer passage and connectivity for wildlife is an effective option in some instances. Where this is not feasible, the Department has purchased habitats important to such

animals as the Florida panther and black bear and constructed structures such as wildlife crossings.

- Greenways are corridors of protected open space that are managed for conservation and recreation. They connect natural preserves, parks, cultural and historic sites, and in some cases, populated areas. The Department participates in the statewide greenways program and provides funding through its Transportation Enhancement Program.
- Historically, roadsides on state highways were managed to prevent roadway erosion and enhance travel safety. Recent strategies include biological control of invasive plants, reestablishment and management of native plants and grasses, controlled burns, application of composted materials, and relocation and restoration of endangered plant species.

Development of a short-range objective for these environmental issues will be developed in 2004 through coordination with our Partners, particularly federal and other state agencies, representatives of local governments and the Metropolitan Planning Organization Advisory Council.

Strategies for the Natural Environment

- ⇒ Increase the use of wetland and wildlife mitigation banks to enhance the surrounding ecosystems (where mitigation is required), and continue to use wetland and wildlife conservation banks that are compatible with other state plans.
- ⇒ Continue to identify, prioritize and construct wildlife crossings that encourage safer wildlife movement in public areas managed for such purposes.
- ⇒ Identify and implement appropriate roadside management techniques that reduce maintenance costs and implement ecosystem management principles.
- ⇒ Continue to assist in implementing regional mitigation programs of Water Management Districts, Florida's Conservation and Recreational Lands Program, Ecosystem Management Program, and Greenways Program, including considering the statewide Greenways System Plan, early in project development phases.
- ⇒ Help ensure that all air quality standards related to mobile source emissions are met, address air quality on a regional basis, and assist MPOs in meeting conformity requirements.
- ⇒ Encourage the use of alternative fuels, improved pollution control devices and cleaner engines, especially in FDOT vehicles.

Focus Area: Safety

Short Range Objectives

- 2.4 By 2011, reduce the highway fatality rate on all public roads to or below 1.3 fatalities per 100 million vehicle miles traveled.
- 2.5 By 2011, reduce the highway fatality rate on the State Highway System to or below 1.5 fatalities per 100 million vehicle miles traveled.
- 2.6 By 2011, reduce the bicyclist fatality rate to or below 0.19 fatalities per 100,000 population.
- 2.7 By 2011, reduce the pedestrian fatality rate to or below 2.35 fatalities per 100,000 population.

Traveling safely is the public's highest expectation from the transportation system. This makes it an important aspect of Floridians' quality of life. Ongoing coordination among all agencies is necessary to cover the many factors related to improving safety, such as driver skill level, driver impairment, the use of safety equipment, vehicle condition, and road and weather conditions.

In 2002, the Department developed a Strategic Highway Safety Plan (SHSP) to provide focus and direction for safety emphasis areas that can be addressed by the Department in the next 3-5 years, supplementing the successful safety programs already being accomplished. The SHSP focuses on five safety areas for additional emphasis:

1. Keep vehicles in the proper travel lane and minimize the effects of leaving the travel lanes.
2. Improve the safety of intersections.
3. Improve access management and conflict point control
4. Improve information and decision support systems.
5. Improve pedestrian and bicycle safety.

These focus areas are supported by strategies that will refocus efforts by implementing new and innovative ideas and techniques, and evaluating and replicating those activities that are having the greatest positive impact on safety.

In 2003, 3,179 people died on Florida's highways. Though highway fatality rates have been falling in recent years, Florida's death toll has remained higher than the national average for more than 20 years. Florida also has the second highest pedestrian fatality rate in the nation. One-in-six bicyclist fatalities in the United States occur in Florida in 2003.

Related 2020 FTP Goals and Objectives

Goal

Safe transportation for residents, visitors and commerce

Long Range Objective

- Reduce the rates of motor vehicle, bicyclist and pedestrian fatalities
- Improve the safety of highway/railroad crossings and other locations where modes intersect
- Improve the safety of commercial vehicle operations
- Improve the safety of seaport, rail and public airport facilities
- Improve the safety of services, vehicles and facilities for transit and for the transportation disadvantaged

Highway-Related Safety

Highway safety experts use the number of highway fatalities per 100 million vehicle miles of travel to calculate a “fatality rate.” It includes motor vehicle fatalities as well as bicyclist and pedestrian fatalities involving motor vehicles. In 2002, Florida’s highway fatality rate was the sixth highest among the eleven southeastern states, higher than the five other most populous states, and higher than the nation as a whole.

In 2003, Florida’s fatality rate declined to 1.71 and the national fatality rate declined to 1.48. In 2003, seven out of ten highway fatalities in Florida were car, truck, or motorcycle occupants. The rest were bicyclists, motorcyclists and pedestrians.

Lead Programs

- Safety
- Preliminary Engineering
- Planning
- Routine Maintenance
- Traffic Engineering

Highways

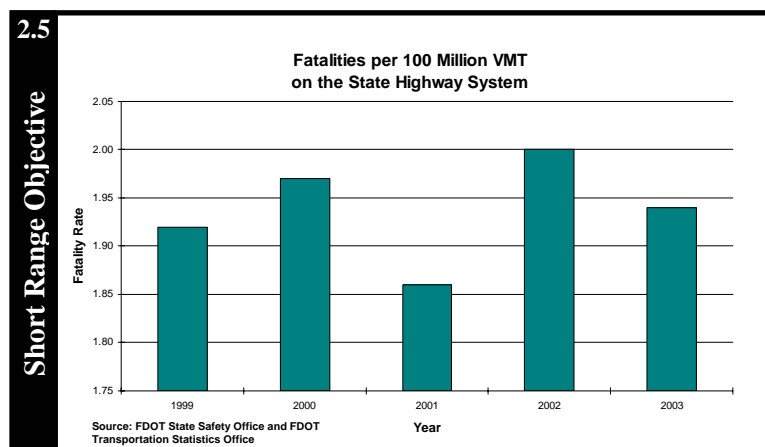
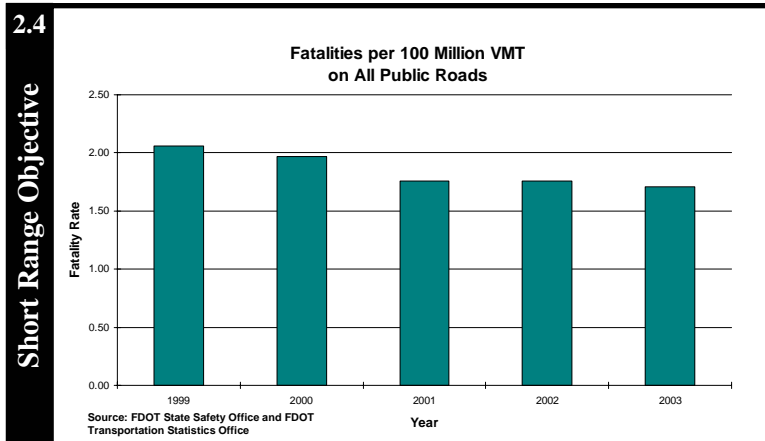
The Department has reconfirmed its long-standing commitment to safety on all public roads. The fatality rate for all public roads dropped substantially from 2.63 in 1990 to 1.71 in 2003.

Consistent with national trends, there was a significant drop in the State’s highway fatality rate between 1990 and 2003. A number of factors contributed to this improvement, including safer highway design, safer motor vehicles, increased seat belt usage, public education and vigorous enforcement of laws related to driving under the influence of drugs or alcohol and improved emergency response and trauma treatment.

Reducing highway-related injuries and fatalities further will take the combined effort of federal, state and local agencies, as well as the driving public. The Department has little control over factors such as driver skills or impairment, presence and use of safety equipment, vehicle condition and weather condition.

Because the Department is responsible for the State Highway System, which includes 12,000 miles of the 117,000 miles of all public roads, the Department tracks the fatality rate for the State Highway System. The fatality rate for 2003 was 1.94.

The Department strives to make sure that the design, construction, maintenance and operation of the State Highway System meet safety standards. Pavements may need to be more skid-resistant or otherwise improved in areas where crash reports indicate problems with pavement conditions.



Strategic Goal 2: Economic Competitiveness, Quality of Life and Transportation Safety

Highway construction and repair sites must be clearly marked and traffic regulated through detours. Hazards within rights of way are identified and removed when possible.

The severity of crashes can be reduced by installing guardrails, dividing highways, adding paved shoulders, using break-away sign posts and placing crash cushions at the end of roadside obstacles. The Department ensures that guardrails and other safety devices are in good condition. Night inspections of signs make sure they are just as visible then as during the day.

The Department cannot, however, eliminate the need for good driver judgment – the most dominant factor in highway safety – in dealing with traffic signals, interchanges and other potential points of conflict between system users. At best, the Department can work to make the highway environment “as safe as possible,” a phrase that denotes an ultimate limit for safety expenditures in relation to other needs. To a large degree, the Department works to reduce crash severity as noted by a continuing decline in the state’s fatality rate.

Bicyclist and Pedestrian Safety

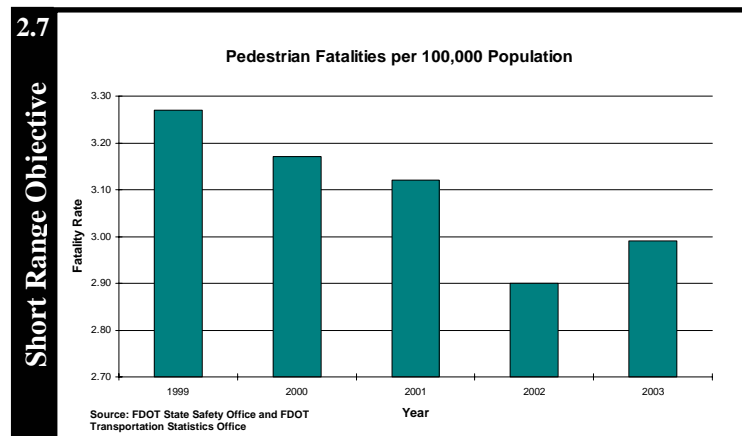
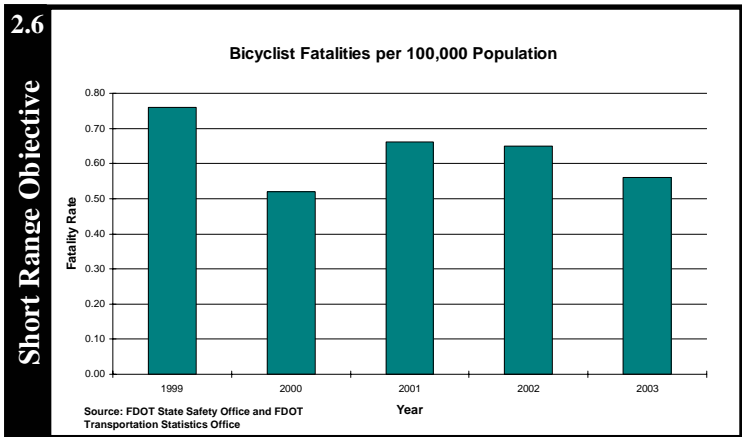
One reason Florida’s highway fatality rate is comparatively high is because we have the second highest number of bicyclist fatalities and the second highest number of pedestrian fatalities in the nation (2003 data). Florida had 95 bicyclist fatalities and 509 pedestrian fatalities on highways in 2003.

The Department has established an objective to reduce bicyclist fatalities.

Because there are no available data on bicyclist exposure or usage such as miles traveled, the fatality rate is based on population. The fatality rate varied between approximately 0.65 and 0.77 fatalities per 100,000 population in the late 1990s. The fatality rate was 0.56 in 2003. The Department is developing a measure that is facility or inventory-based.

The Department has established an objective to reduce pedestrian fatalities. Because there are no available data on pedestrian exposure or usage, the fatality rate is based on population. The pedestrian fatality rate per 100,000 population has gradually decreased from almost four fatalities in 1996 to approximately 3.0 fatalities per 100,000 population in 2003. The Department is developing a measure that is facility or inventory-based.

The Department has completed extensive research into the root causes of pedestrian and bicyclist fatalities on the State Highway System. Alcohol use has been found to be a known or possible factor in about half of all fatal pedestrian and bicyclist crashes, often on the part of the



pedestrian or bicyclist. Mid-block crossings, away from the protection afforded by traffic signals, were commonly associated with pedestrian fatalities. There is also a higher incidence of fatalities for bicyclists who travel in urban areas at night because bicycles frequently lack proper lighting. Increased mobility is the primary reason for providing pedestrian and bicyclist accommodations, yet the Department recognizes the need to help ensure these facilities are safe. Studies are currently underway to determine if particular trends in incidences of fatalities could be remedied by modification of design standards.

Strategies for Highway-Related Safety

To help meet these short-range objectives, the Department will:

- ⇒ Identify locations having significant crash trends involving leaving the normal path of travel and develop and implement comprehensive countermeasures in the “3-E” areas (engineering, enforcement, and education) at these locations.
- ⇒ Identify locations on planned projects that have roadway characteristics similar to those in the strategies above and develop proactive countermeasures in the “3-E” areas of engineering, enforcement, and education, to be implemented in the projects.
- ⇒ Establish an incentive program to improve roadside safety on local roadways, including the selection, installation and maintenance of upgraded roadside safety hardware at selected locations.
- ⇒ Identify, acquire, and implement technologies available to collect, analyze and disseminate traffic safety data in a timely and accurate manner.
- ⇒ Create a statewide compatible system of traffic safety data that is efficient and reliable for both internal and external stakeholders.
- ⇒ Maintain Internet web page to inform stakeholders of research and other projects underway that affect traffic safety for interested parties to learn of the development of new methodologies and review interim and final results/recommendations.
- ⇒ Continue to identify, address, coordinate and implement highway safety activities in the areas of: community traffic safety teams; alcohol/drug programs; safety belt and child restraint programs; motorcycle, pedestrian and bicycle safety; public education; rail-highway grade crossing safety; speed and aggressive driving programs; work zone safety; elder drivers, and commercial motor carriers, as well as improve the consideration of safety during planning, design and construction of projects.
- ⇒ Develop and implement improvement projects at 20 additional high-crash intersections (signalized and un-signalized) per district over the next 5 years.
- ⇒ Improve the ability to enforce traffic violations at high-crash intersections by using red light enforcement lights and other innovative techniques.
- ⇒ Develop and deliver an intersection safety education program for the public.
- ⇒ Enhance work zone safety by better informing motorists of hazards and by providing additional worker protection.
- ⇒ Identify high pedestrian and bicycle crash corridors and develop corrective measures in the “3-E” areas.
- ⇒ Identify pedestrian/bicycle facility deficiencies (gaps) and develop projects to correct them.
- ⇒ Conduct training on accommodation of bicyclists and pedestrians in the design process.

Safety of Seaport, Rail and Public Airport Facilities

Since 9-11-01, cargo and passenger safety and security are important issues to the local governments and port authorities that own and operate Florida's Seaports. Funds primarily used for seaport economic development have been diverted to security operations and infrastructure projects. The Department's role in seaport security is to process security grants, pass through Federal/State funding to ports, and act as a voting member of Florida Seaport Transportation and Economic Development

Council, where the Department may approve funding for security projects. The Department is also actively involved in the project approval process for the Intermodal Access Bond Program. Since its inception in 1996, the bond program has produced over 160 projects valued at \$420 million.

Lead Programs

- Safety
- Seaports
- Aviation
- Rail

There are about 5,300 locations in Florida where the highway and rail transportation systems intersect. Approximately 52 percent of them are equipped with active warning devices, or over twice the national average. Accidents and fatalities at crossings declined 75 percent and 60 percent, respectively, between the mid-1970s and the mid-1990s. This occurred despite an increase in exposure because of increased highway traffic and operational changes that have resulted in more trains on fewer rail lines. In 2003, there were 94 accidents at highway-railroad grade crossings with 13 fatalities and 36 injuries. The Department uses the latest technology and techniques such as those for grade crossing safety improvements and grade crossing consolidation. Public information is one of the most effective methods of reducing grade crossing incidents. Florida participates in Operation Lifesaver, a non-profit organization dedicated to reduce the number of collisions, deaths and injuries at rail-highway crossings and on railroad rights-of-way through public awareness campaigns.

There were 274 train derailments in 1977, the year before the Department began its railroad safety inspection program. Derailments have declined to an average of 37 per year over the last 10 years, most of which occur in industrial yard tracks and result in little damage. There were 38 derailments in 2003. Annually, the Department performs safety inspections on 5,000 miles of track, 3,000 turnouts, 14,000 freight cars and 500 locomotives, and observes 1,000 operating practices. These inspections supplement those conducted by the railroads, which have the primary responsibility for safe operations.

During the decade from 1994 through 2003, Florida experienced a high of 36 fatal aircraft accidents in 2002 and a low of 15 fatal aircraft accidents in 2001 with an average of 27 fatal accidents per year. Of these accidents, four involved commercial airline aircraft and six involved commuter aircraft. The remaining accidents involved general aviation aircraft. There is no upward or downward trend in fatal aircraft accidents from year to year. The number of accidents per year appears to be random.

The Department, the Federal Aviation Administration and local governments share complementary aviation safety responsibilities in Florida. The Department regulates Florida's 131 public airports through permitting, safety inspections and licensing. The Department permits and registers 679 private airports. The Federal Aviation Administration regulates aircraft, aircraft operations and pilots. The Federal Aviation Administration also places specific safety requirements, such as crash, fire and rescue facilities, on airports before permitting commercial airline operations at an airport.

The Department, the Federal Aviation Administration and local governments share airspace safety responsibilities in Florida. The Department and local governments are responsible for permitting structures throughout the state that may impact aviation safety while the Federal Aviation Administration assures that aircraft flight paths will stay clear of structures.

Strategies for Safety of Seaport, Rail and Public Airport Facilities

While we work with our partners to develop short-range objectives, the Department will:

- ⇒ Continue to conduct public education campaigns for awareness of rail-highway crossing safety.
- ⇒ Conduct research into innovative highway safety devices, including those which prohibit motorists from driving around rail-highway crossing protection systems, and work with appropriate agencies to incorporate research results into program development.
- ⇒ Identify hazardous roadway locations and features, including those at rail-highway crossings, and establish priorities to correct them.

Strategic Goal 3: Organizational Excellence

Focus Areas:
Customers
Work Program
Organizational Performance

The Department will work with its Partners to achieve the goals and objectives established in the 2020 FTP. We realize that this will not be an easy task. Florida will continue to grow rapidly and must position itself to compete successfully in the global economy. At the same time, we want to enhance Floridians' quality of life and preserve our fragile

environment.

We also know that state, metropolitan and local plans will continue to show that the cost of needed transportation improvements will exceed available revenues. This makes it essential that all Partners achieve maximum returns on their investments as they carry out those plans.

We will do our part. The Department is committed to increasing our efficiency and effectiveness as we carry out our responsibilities. Starting with our participation in the Sterling Quality Challenge in 1997, we have undertaken a thorough self-examination of everything we do and how we do it.

We have adopted the Sterling Business Model for organizational performance excellence as the FDOT Business Model. The Sterling criteria are designed to assist organizations to continually improve how they do business. The criteria are based on an integrated set of basic values, requirements, and processes specifically designed to promote and encourage excellence based on the principles of leadership, employee involvement, customer satisfaction and continuous improvement.

The path to achieving organizational performance excellence is a continuous and dynamic process that involves all functional areas of the Department. We are determined to make a good agency even better by measuring and improving our performance in many areas.

This strategic goal addresses three focus areas: Customers, Work Program, and Organizational Performance. Strategic objectives have been established for each focus area. Initially, these strategic objectives were adopted as "short range objectives" for this Implementation Plan; the Department continues to improve these objectives by making them more specific and measurable as we incorporate the FDOT Business Model processes in all phases of our business operations.



Focus Area: Customers

Short Range Objectives

- 3.1 Improve external customer satisfaction
- 3.2 Improve response to external customer issues

Federal and state laws require the Department to provide “early, often and continuous” access to transportation decision-making. The Department is going beyond these requirements to ensure that transportation programs and projects respond to, and are carried out, in ways that best address what our customers want. This effort will lead to the identification of how we can strengthen customer relationships and measure customer satisfaction.

Related 2020 FTP Goals and Objectives

All goals and long range objectives

It is important to identify the Department’s broad products, services, and customers. We also must have a clear understanding of the valid requirements of our customers. That understanding was enhanced through major public involvement programs carried out for the development of the 2020 FTP in 1994 and during its update in 1999-2000. The views, ideas and opinions of all interested parties have been reflected in Florida’s long range transportation goals and objectives.

How do we know whether our customers believe we are doing our part to achieve these goals? The Department completed the second survey of our customers in 2002. Information from the survey is being used to evaluate customer satisfaction with Department policies and actions and to identify needed improvements in our policies and practices. In addition, complaints from the Department’s customers are being analyzed to determine what specific actions may be undertaken to reduce the number of complaints in the future.

Customer Satisfaction

The first objective to help achieve organizational excellence is to satisfy customers external to the Department. In order to determine whether we are meeting our customers’ needs we conducted customer satisfaction surveys in 2000 and 2002. The purpose of the surveys was to measure customer satisfaction, to make improvements in what we do and how we do it, and to address identified concerns. We will conduct surveys every two years to measure the effectiveness of the improvements we make and to compare with the baseline survey. Our 2004 survey is underway and the results will be reported in the next Short-Range Component.

Lead Programs

- Administration
- Construction Engineering Inspection
- Materials and Research
- Motor Carrier Compliance
- Planning
- Preliminary Engineering
- Public Transportation Operations
- Right-of-Way Support
- Routine Maintenance
- Safety
- Toll Operations
- Traffic Engineering

Results from both surveys provided overall measures for all or most customers – residents, “well elders,” commercial drivers, government officials and visitors. Common issues appearing on most surveys included:

- Roadway signs and markings
- Construction projects
- Other roadway issues (safety, roadway condition)

The “selected results” table is a summary of the survey. In most cases, the results for all customers that responded to the survey are shown. “Percent Satisfied” includes responses of “very satisfied” and “satisfied.”

Our customers were satisfied with roadway signs and the visibility of pavement striping and markings during daytime driving. Customers were not as satisfied with visibility of roadway markings at night.

Our customers were satisfied with construction signs and markings and with completed projects. They were substantially less satisfied with access to local businesses during construction and the time it takes to complete construction.

Respondents were more satisfied with the time it took to travel between cities and within cities. About half of the respondents were satisfied with the level of traffic congestion.

Government officials seem to be satisfied with their ability to obtain information from the Department, including advance notification of construction projects. They were not as satisfied with Department efforts to seek their input regarding the establishment of priorities for transportation projects or during the design phase of future projects.

Most respondents appear to be satisfied with the safety of the State Highway System. They were somewhat less satisfied with the smoothness of highways.

Our analysis of the 2002 surveys indicates that improvement in customer satisfaction was observed in one of the four statewide improvement areas identified by the Department (see table below). The Department plans to continue statewide and district efforts to improve customer satisfaction in these key areas.

Selected Results, Customer Satisfaction Survey

Issue	Percent Satisfied*	
	2000	2002
<i>Roadway Signs and Markings (Residents Only)</i>		
Visibility and Readability of Signs	90	91
Daytime Visibility of Markings	89	87
Nighttime Visibility of Markings	66	66
<i>Construction Projects (Residents Only)</i>		
Signs and Markings	83	84
Projects After Completion	85	85
Business Access	45	47
Timeliness of Completion	34	35
<i>Traffic Flow (Residents Only)</i>		
Travel Time Between Cities	68	70
Travel Time Within Cities	58	62
Traffic Congestion	44	46
<i>Coordination (Government Officials Only)</i>		
Ability to Obtain information	94	94
Advance Notice of Construction Projects	92	89
Seeking Input to Establish Priorities	77	77
Seeking Input During project Design	73	78
<i>Other State Highway System Issues (All Customers)</i>		
Safety	81	84
Roadway Smoothness	77	76
Attractiveness of Highways	77	80

*Results for all respondents except as shown. Contact the Office of Policy Planning for more detailed results.

Improvement Area	Districts
Access to business during construction	1,2,4,5,6,7
Night-time visibility of roadway markings	1,2,4,5,7
Timely completion of construction projects	1,2,4,5,7
Sidewalks/bike lanes on state highways	3
Roadway smoothness	3
Intra-city travel time	4
Attractive, litter-free roadsides	6
Seeking government input during design	1,2,5,6
Maintain premium service on the road	Turnpike
Offer convenience and value at the service plazas	Turnpike
Provide outstanding toll collection services that are customer focused, cost efficient and state-of-the-art	Turnpike

Statewide Improvement Area	Change in Customer Satisfaction
Night-time visibility of roadway markings	No significant change
Timely completion of construction projects	No significant change
Access to businesses during construction	No significant change
Seeking government input on design	5% increase

Customer Issues

Being customer driven means much more than error reduction, merely meeting specifications, or reducing complaints. Nevertheless, error reduction and elimination of causes of dissatisfaction contribute to our customers' view of the Department and are thus important parts of being customer driven. In addition, our success in recovering from defects and mistakes ("making things right for your customer") is crucial to building customer relationships.

The Department has adopted an objective to improve response to external customer issues. A web-based application called FDOTracker is now being used to track and resolve customer complaints.

Lead Programs

- Administration
- Construction Engineering Inspection
- Materials and Research
- Motor Carrier Compliance
- Planning
- Preliminary Engineering
- Public Transportation Operations
- Right-of-Way Support
- Routine Maintenance
- Safety
- Toll Operations
- Traffic Engineering

FDOTracker is capable of tracking telephone calls, e-mails and hard copy correspondence. FDOTracker is integrated with the department's e-mail system which enables issues to be routed to the appropriate FDOT representative/office for resolution. The system is intended to log complaints or issues from external customers, media, elected/government officials, citizen complaints/suggestions, and hot issues. The database can tell us about areas of most interest to the public, which are areas we can improve on. The database can also allow us to target specific issues, reduce potential complaints before they become problems, and monitor trends and patterns.

Strategies for Customer Satisfaction and Customer Issues

The Department will ensure that the short-range objectives are achieved through these actions:

- ⇒ Evaluate customer satisfaction through biennial surveys to identify customer needs and expectations.
- ⇒ Develop action plans for targeted issues identified statewide and in each District.
- ⇒ Aggregate and analyze customer complaints, determine root causes and corrective actions that can lead to the elimination of most complaints.

Measures of Effectiveness	Baseline Data
	2000
Percent external customer satisfaction.	76%
Percent customers satisfied with local input on design.	73%
Percent customers satisfied with access to business.	53%
Percent customers satisfied with timeliness of completing construction.	44%
	FY 2003/04
Total customer issues tracked	3,158
Percent issues resolved within 10 working days	78.8%

Focus Area: Work Program

Short Range Objectives

- 3.3 Improve project delivery
- 3.4 Implement the Strategic Highway Safety Plan

One of the most important things the Department can do to carry out the goals of the 2020 FTP is to ensure that the projects that have been identified as most important, and that have been incorporated in the Department's work program, are delivered on schedule while minimizing the cost and time to complete them.

Related 2020 FTP Goals and Objectives

All goals and long range objectives

If state, regional or local plans identify needs soon enough, we know what we need to do before the need is critical. That is a major reason why we develop 20-year plans. It also takes time to provide a major transportation project after the project is identified in a plan.

During the last decade, the Department has pursued a short-range objective to "annually maintain or advance the schedule of at least 80 percent of project phases in the Department's adopted work program." This objective has been met for the last six years. While this remains a key strategy and a measure of the Department's effectiveness, new short-range objectives have been established to incorporate other important issues.

Project Delivery

Meeting the commitment schedules identified in the work program is a critical first step in project delivery. However, many factors can affect how much time is needed for, as well as the ultimate cost of, an improvement. If major conflicts were not resolved in initial planning activities, project development can take three or more years. In highly developed urban areas, right of way acquisition may take more than two years. The removal of hazardous waste, the inclusion of major structures such as bridges and changes in local priorities may also increase the production time from one to three years.

Lead Programs

- Administration
- Construction Engineering Inspection
- Materials and Research
- Motor Carrier Compliance
- Planning
- Preliminary Engineering
- Public Transportation Operations
- Right-of-Way Support
- Routine Maintenance
- Safety
- Toll Operations
- Traffic Engineering

The Department is also sensitive to the costs and inconveniences highway construction can cause to nearby business owners and the traveling public. In an effort to reduce or eliminate these problems, the department has instituted a variety of alternative contracting methods and is evaluating their effectiveness. Through creative contracting practices, the department can encourage innovation on the contractor's part to complete projects earlier and with fewer delays and cost overruns. The Department will continue to focus on improving the entire planning, programming and project delivery process to help meet work program commitments and minimize increases in the time and cost to deliver transportation projects.

Strategies for Project Delivery

The Department will ensure that this short-range objective is achieved through these actions:

- ⇒ Ensure adequate production efforts to meet scheduled contract letting targets.
- ⇒ Complete construction projects on time and within budget.
- ⇒ Identify and resolve issues that could delay project implementation early in the planning and project development processes.
- ⇒ Ensure the timely, cost-effective development and implementation of quality work programs.
- ⇒ Maintain information systems that assist in delivering the work program.
- ⇒ Support Computer Assisted Drafting and Design (CADD) Systems.

Measures of Effectiveness	Baseline Data FY 1995/96	FY 2003/04 Data
Percentage increase in number of days required for completed construction contracts over original contract days (less weather days).	32.1%	8.6%
Percentage increase in final amount paid for completed construction contracts over original contract amount.	11%	9.5%
Percentage of construction contracts planned for letting that were actually let.	96%	99.3%
Number of projects certified ready for construction.	78	81
Projects with right-of-way support provided.	260 (2000/01)	441

Highway Safety

Because traveling safely is the public's highest expectation of the transportation system, the Department is committed to making safety a high priority in everything it does to deliver the Work Program. There are many factors related to safe travel, including driver skill levels and impairment, the use of safety equipment by travelers, vehicle condition, and road and weather conditions. Coordination with other agencies and local governments is essential to address all factors. The Department administers many highway safety activities and programs, including, but not limited to:

- Hazard Elimination Program
- Rail-Highway Grade Crossing Program
- Traffic Safety Grant Programs
- Motor Carrier Safety Assistance Program
- Pedestrian/Bicycle Safety Program
- Community Traffic Safety Teams
- Safety standards on regular construction projects

Lead Programs

- Administration
- Construction Engineering Inspection
- Materials and Research
- Motor Carrier Compliance
- Planning
- Preliminary Engineering
- Design
- Public Transportation Operations
- Right-of-Way Support
- Routine Maintenance
- Safety
- Toll Operations

In 2002, the Department developed a Strategic Highway Safety Plan (SHSP) to provide focus and direction for safety emphasis areas that can be addressed by the Department in the next 3-5 years, supplementing the successful safety programs already being accomplished. Part 1 of the SHSP focuses on five key emphasis areas:

Strategic Goal 3: Organizational Excellence

1. Keep vehicles in the proper travel lane and minimize the effects of leaving the travel lanes.
2. Improve the safety of intersections.
3. Improve access management and conflict point control
4. Improve information and decision support systems.
5. Improve pedestrian and bicycle safety.

The Department will implement specific strategies in each of the five areas, including a variety of new or innovative techniques, and will evaluate and replicate those countermeasures having the greatest positive impact on highway safety.

Short Range Objectives have been defined for many aspects of transportation safety and are discussed in detail under the System Efficiency and Safety Focus Areas. Please see those discussions for more information, including strategies for achieving the objectives. Ongoing coordination among all agencies involved in highway safety is necessary to cover the many factors related to improving safety, such as driver skill level, driver impairment, the use of safety equipment, vehicle condition, and road and weather conditions.

Identifying Safety Issues

The Department coordinates a Safety Management System that addresses emerging safety issues in cooperation with local government officials and other safety related disciplines. This program, in concert with local Community Traffic Safety Teams, has led to enhanced safety awareness and coordination that will result in more efficient delivery of all safety programs.

Safety is also covered in Strategic Goals 1 and 2. It is a part of “what we do”: we strive to provide a safe transportation system. This section deals with how we provide that safe system. As a result, the information included in the previous sections of the report is not repeated here.

Strategies for Transportation System Safety

To help ensure the safety of the transportation system, the Department will:

- ⇒ Work with our partners to identify the causes of crashes and develop appropriate countermeasures.
- ⇒ Continue Implementation of the Strategic Highway Safety Plan.

Focus Area: Organizational Performance

Short Range Objectives

- 3.5 Implement the DOT Business Model statewide
- 3.6 Improve the leadership effectiveness system
- 3.7 Address workforce development issues
- 3.8 Improve effectiveness of communication to all levels of the organization

This focus area also affects all of the Department's actions. It establishes short-range objectives and measures so we will know if our efforts produce the results that we intended. We also know that Florida will best be served with a highly motivated and committed work force led by managers whose decisions and leadership skills constantly improve the effectiveness of the Department's human and financial resources.

Related 2020 FTP Goals and Objectives

All goals and long range objectives

As the Department continues to incorporate Sterling Criteria as part of its everyday business processes, it is thoroughly examining how it carries out its responsibilities, how it encourages and measures the performance of its employees, and the effectiveness of its leaders and managers in carrying out their responsibilities.

DOT Business Model

We continue to enhance a management system that focuses on the intended results of our key activities. As part of examining ways to improve our performance, we have identified our major "core processes" that are essential to delivering our facilities and services to our customers: Floridians, visitors and businesses. The four core processes are "plan," "produce," "deliver," and "maintain and operate." Core process maps are complete for all of the four areas. A number of performance measures and indicators have been established for each core process so that the results of the activities in each can be monitored, the need for improvements can be more readily identified, and the efficiency and effectiveness of each core process can be strengthened.

"Plan" includes all activities related to the development and adoption of the Florida Transportation Plan, the 10-year Program and Resource Plan and the 5-year Work Program, along with all planning activities associated with the planning for and identification of projects in District, metropolitan and local plans and studies. "Produce" includes activities related for preliminary engineering and environmental documentation of proposed projects, final engineering design and right-of-way acquisition (i.e., activities required before projects are ready for construction). The "deliver" core process focuses on the construction of projects. "Maintain and operate" includes the monitoring of system condition and operations, as well as the actual operation and maintenance of the system.

Lead Programs

- Administration
- Construction Engineering Inspection
- Materials and Research
- Motor Carrier Compliance
- Planning
- Preliminary Engineering
- Public Transportation Operations
- Right-of-Way Support
- Routine Maintenance
- Safety
- Toll Operations
- Traffic Engineering

Strategic Goal 3: Organizational Excellence

In the past year, the Department has expanded its efforts to link strategic planning, performance measures, and desired outcomes focused on creating and balancing value for all our stakeholders – customers, employees, partners, the public, and the community. We have begun implementation of a “tiered Business Plan” to meet the sometimes conflicting and changing aims that balancing value implies. Our organizational strategies need to explicitly include all stakeholder requirements. This will help to ensure actions and plans meet differing stakeholder needs and avoid adverse impacts on any stakeholders. The first tier of the Business Plan is in place, Tier 2 is 85% in place and work will continue to create and implement the remaining tiers over the next eighteen months. An information and analysis program is being installed which is specifically designed to display key performance measures. This will enable easier management of processes and provide support to management decision-making.

Strategies for the DOT Business Model

The Department will ensure that this short-range objective is achieved through these actions:

- ⇒ Continue to develop and refine “core process” initiatives to support a results based management system.
- ⇒ Monitor the results of “core process” activities to identify the need for improvements that can strengthen their efficiency and effectiveness.
- ⇒ Continue to develop and refine performance measures that create and balance value for all customers.
- ⇒ Employ technological tools that provide management with readily available information on key performance measures to support decision making.
- ⇒ Continue and expand the implementation of the tiered business plans.

Measures of Effectiveness	Baseline Data
Percent of core processes with control systems operational.	100%
Number of key sub processes with control systems operational.	20%
Number of key performance measures defined within the monitoring system.	80%
Percent of key performance measures monitored by automated information system.	TBD
Percent of Tier 2 plans in place and being monitored and measured.	85% (100% by February 05)
Percent of Tier 3 plans in place and being monitored and measured.	100% by July 05

Leadership Effectiveness System

In order to create and sustain a high performing organization you must have good leadership. Good leaders set directions, communicate and deploy values and performance expectations, and take into account the expectation of customers and other stakeholders. They create an environment for innovation, learning and knowledge sharing. The Department is undertaking an assessment of these areas to identify ways to improve the effectiveness of its senior leaders.

Lead Programs

- All Supervisors

A key area is strengthening the leadership team’s review of the Department’s performance and feedback obtained from customer and employee surveys. These reviews can lead to the identification of areas of improvement and specific actions by the leadership team to improve the Department’s performance. Results of the employee surveys, begun in 1999, have been used by the Department’s Executive Board to give focus to specific actions to address concerns. This means a direct response by the Executive Board to the cumulative voice of employees. In some areas, focus

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groups also have been used to help identify or better define issues on a statewide and District level. Results of the survey are used down to the Cost Center level as the basis for action planning to address employee concerns.

Senior leaders should serve as role models through their ethical behavior and personal roles in planning, communications, coaching, developing future leaders, review of organizational performance, and employee recognition. “Core competencies” have been established that define these roles and they have been made part of the review and performance plan for the executive board level employee to the director level. This will reinforce values and expectations and build leadership, commitment, and initiative throughout the organization.

The Department is working to build and encourage an organizational culture of empowerment, innovation, agility and learning from the ground up. Each employee creates an Individual Training Plan (ITP) with his/her supervisor. This process, which has been in place for over 6 years, is developing into a clear link between organizational objectives and employee learning. The Department sees ITPs as a vital part of our ongoing organizational and individual learning environment.

Functional and Cross Functional teams of employees routinely address both work environment and work process issues. This team approach to problem solving was introduced in DOT in 1985 and though it has been known by many names, continues as a strong and successful part of our culture in many parts of the organization.

The FDOT recognizes the importance of being a “good neighbor” to those affected by the Department’s delivery of transportation products and services as well as improving the communities in which we live and work. FDOT demonstrates commitment to its public responsibilities and community involvement by engaging in multiple proactive operations that are designed to assess, anticipate and manage the effects it has on society. One of the Agency’s approaches to support the commitment to its public responsibility and community involvement is through public hearings and forums held to disseminate information and obtain feedback. Additionally, regular meetings are scheduled with the Regional Planning Councils, MPO’s, the Florida Transportation Commission and the Metropolitan Planning Organization Advisory Council.

FDOT’s senior leaders measure their effectiveness in leading the organization from a product/service delivery standpoint by monitoring the development and implementation of the Five Year Work Program, and how the products and services included meet the goals of the FTP.

Measures of Effectiveness	Baseline Data 2000	2004 Data
Score on leadership system questions from employee survey.	1.91*	2.11*
Score on credibility questions from employee survey.	1.65*	1.90*
*Survey responses were assigned a score from 0 to 3. The higher the score the more favorable the response.		

Strategies for Leadership System

To help achieve the short-range objective, the Department’s leaders will:

- ⇒ Continue reviews of Department performance and feedback from customers and employees to identify areas of improvement and specific actions to improve performance.
- ⇒ Serve as role models to employees.

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- ⇒ Continue to assign employee teams to address work environment and work process issues and support team recommendations to the maximum extent possible.

Workforce Development Issues

Any organization's success depends increasingly on the knowledge, skills, innovative creativity, and motivation of its employees and partners. Valuing employees means committing to their satisfaction, development, and well-being. Increasingly, this involves more flexible, high performance work practices tailored to employees with diverse workplace and home life needs. Major challenges in valuing the Department's employees include:

Lead Programs

- All Supervisors

- Demonstrating leaders' commitment to employees;
- Providing recognition opportunities that go beyond the normal compensation system;
- Providing opportunities for development and growth within the Department;
- Sharing the Department's knowledge so our employees can better serve our customers and contribute to achieving our objectives; and
- Creating an environment that encourages risk taking.

As the Department concludes to move toward its target of reducing its work force by 25 percent from the year 2000 level and contracting with the private sector for more of its responsibilities, it is imperative that the Department ensures the well-being, satisfaction and motivation of all employees. A number of initiatives are underway in the areas of employee involvement in decision-making, recognition, and compensation, all of which contribute to employee satisfaction.

In addition, annual surveys were initiated in 1999 to measure employees' opinions on these and related issues. A small but statistically significant improvement in overall FDOT job satisfaction was reflected in the 2000 Employee survey. Survey results show areas of pay, recognition and employee involvement continue to be the greatest concern for employees. Increases in employee satisfaction were greater for the most satisfied employees than for the least satisfied employees.

Strategies for Workforce Development

The Department will ensure that this short-range objective is achieved through these actions:

- ⇒ Conduct annual employee surveys to identify issues and areas that can be improved to increase employee productivity and satisfaction.
- ⇒ Fully implement People First, addressing issues of recruitment, selection and retention.
- ⇒ Establish benchmark practices in employee well-being, training and performance management.

Measures of Effectiveness	Baseline Data 2000	2004 Data*
Satisfaction with employee pay.	.87	1.28
Satisfaction with employee recognition.	1.30	1.77
Satisfaction with employee involvement.	1.76	2.08
Overall employee satisfaction. (questions 14, 30, 53)	2.25	2.39

*Survey responses were assigned a score from 0 to 3. The higher the score the more favorable the response.

Effectiveness of Communication to All Levels of the Organization

For all the things we do within the Department, **everything we do** is dependent on communication. Communication (interpersonal skills, oral and written communication) is one of the Core Competencies for senior leaders, managers, and supervisors of the Florida Department of Transportation and each is expected to exhibit excellent communication skills. Communication with our internal and external customers is key to achieving excellence.

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Communication is more than sending emails with the meeting minutes attached. It is informally following up to verify understanding of the minutes throughout the unit. It is listening to understand issues and concerns. It is communicating a consistent and timely message that is understood by everyone regardless of a person's background, training, education, and/or experience.

To reduce time wasted, damaged morale, and to improve management credibility regarding information distribution, all leaders within the Department are expected to follow the Leadership Communication Policy and Procedure.

Strategies for Effective Communication

The Department will ensure that this short-range objective is achieved through these actions:

- ⇒ Implement Communications Policy and Guidelines.
- ⇒ Implement *Leadership Achieving New Heights* procedure.
- ⇒ Implement Communications Champions Action Plans adopted by the Executive Board, in November 2003.

Measures of Effectiveness	Baseline Data 2000	2004 Data*
Avg. Score on communications items (5, 8, 12, 16)	1.94	2.17
Avg. Score on communications items (29, 44, 51)	1.63	1.91
*Survey responses were assigned a score from 0 to 3. The higher the score the more favorable the response.		

Glossary

Access Management - The control and regulation of the spacing and design of driveways, medians, median openings, traffic signals and intersections on arterial roads to improve safe and efficient traffic flow on the road system.

Advance Acquisition - The acquisition of real property rights for use on a transportation corridor in advance of the fiscal year in which right of way acquisition would normally occur. This is done to take advantage of favorable prices or the availability of land and to preclude further development that would make the property more costly to the public.

Community - A physical or cultural grouping of stakeholders with common interests created by shared proximity or use. Community can be defined at various levels within a larger context (e.g., neighborhood or city or metropolitan area or region).

Concurrency - As used in growth management, the requirement that public facilities and services needed to support development shall be available at the same time the impacts of such development will occur. For transportation facilities and services, there are specific legal criteria that address the time requirements for providing services and facilities, jurisdiction over level of service standards for specific portions of the highway and road system, and other issues.

Conformity - a) Under subsection 176(c) of the Clean Air Act Amendments of 1990, defined as agreement "... to an implementation plan's purpose of eliminating or reducing the severity and number of violations of the National Ambient Air Quality Standards (NAAQS) and achieving expeditious attainment of such standards..." ensuring that "...such activities will not cause or contribute to any new violation of any standard in any area; increase the frequency or severity of any existing violation of any standard in any area; or delay timely implementation of any standard or any required interim emission reductions or other milestone on any area." b) In general, the agreement of transportation plans and programs with assumptions and commitments designed to attain federal and state air quality standards.

Congestion - The level at which transportation system performance is no longer acceptable due to traffic interference. The level of acceptable system performance may vary by type of transportation facility, state or local government policy, geographic location (metropolitan area or subarea, rural area, etc.) or time of day.

Containerized Cargo - Cargo that is transported in containers that can be transferred easily from one transportation mode to another.

Controlled Access Facility - a roadway where the spacing and design of driveways, medians, median openings, traffic signals and intersections are strictly regulated by consideration of such factors as traffic volume, number of lanes and adjacent land use.

Demand Management - A set of strategies that promote increased efficiency of the transportation system by influencing individual travel behavior.

Ecosystem Management - An integrated, flexible approach to management of Florida's biological and physical environments conducted through the use of tools such as planning, land acquisition, environmental education and pollution prevention. This management approach is designed to maintain, protect and improve the State's natural, managed and human communities.

ETDM Efficient Transportation Decision-Making (ETDM) – A FDOT initiative to improve and streamline the environmental review and permitting process by involving resource protection agencies and concerned communities from the first step of planning throughout the life of the project leading to improved linkage of transportation decisions with social, land use and ecosystem preservation decisions.

Emerging SIS – Facilities and services of statewide or interregional significance that are potential candidates for inclusion in future updates of the SIS.

Fatality Rate - The number of fatalities per 100 million vehicle miles traveled.

Federal-Aid Highway - Those highways eligible for assistance under Title 23 of the United States Code, which does not include those functionally classified as local or rural minor collectors.

FIHS Florida Intrastate Highway System - A system of existing and future limited access and controlled access facilities that have the capacity to provide high-speed and high-volume traffic movements in an efficient and safe manner.

FTP 2020 Florida Transportation Plan - A statewide plan that defines Florida's long range transportation goals and objectives at least through the year 2020.

Greenway - A corridor of protected open space that is managed for conservation or recreation purposes. Greenways follow natural land or water features such as ridges or rivers, or human landscape features such as abandoned railroad corridors or canals. They link natural reserves, parks, and cultural and historic sites with one another and, in some cases, with populated areas.

HOV High-Occupancy Vehicle - Any vehicle carrying two or more passengers.

Highway Fatalities - All deaths in which a motor vehicle was the cause of the fatality. This includes pedestrians and bicyclists killed by motor vehicles as well as vehicle occupants.

Human Environment - The surroundings in which people conduct their lives, including built and natural environments, as well as cultural resources.

Impacts - The effects of a transportation project, including (a) direct (primary) effects; (b) indirect (secondary) effects; and (c) cumulative effects.

Incident - An event that causes a temporary, significant disruption in transportation services.

ITS Intelligent Transportation Systems - A wide range of advanced technologies and ideas, which, in combination, can improve mobility and transportation productivity, enhance safety, maximize the use of existing transportation facilities, conserve energy resources and reduce adverse environmental effects.

Intermodal - Between or including more than one means of transportation.

Intermodal Development Program - Provides for major capital investments in fixed-guideway transportation systems, access to seaports, airports and other transportation terminals; providing for the construction of intermodal or multimodal terminals; and to otherwise facilitating the intermodal or multimodal movement of people and goods.

Lead Programs - Department programs primarily responsible for the short range objectives and strategies identified in a Short Range Component of the Florida Transportation Plan.

LBR Legislative Budget Request – A request to the legislature filed pursuant to S. 216.023, Florida Statutes, or supplemental detailed requests filed with the Legislature, for the amounts of money an agency or branch of government believes will be needed to perform the functions that it is authorized, or which it is requesting authorization by law, to perform. A Legislative Budget Request is filed each year.

LOS Level of Service - A qualitative assessment of a road's operating conditions. For local government comprehensive planning purposes, level of service means an indicator of the extent or degree of service provided by, or proposed to be provided by, a facility based on and related to the operational characteristics of the facility. Level of service indicates the capacity per unit of demand for each public facility.

Livable Community - A neighborhood, community or region with compact, multidimensional land use patterns that ensure a mix of uses, minimize the impact of cars, and promote walking, bicycling and transit access to employment, education, recreation, entertainment, shopping and services.

Long Range Goal - A long-term (20-25 years) end toward which programs and activities are ultimately directed.

Long Range Objective - A long-term (20-25 years) general end that is achievable and marks progress toward a goal.

Long Range Component - The long range part of the Florida Transportation Plan, updated at least every five years, or more often as needed, to reflect changes in issues and Florida's long range transportation goals and objectives for the ensuing 20 years.

LRPP Long Range Program Plan - A 5-year plan developed by each state agency to achieve state goals, agency program objectives and the service outcomes from those programs. It provides the framework for developing agency budget requests and related performance measures.

MPO Metropolitan Planning Organization - An organization made up of local elected and appointed officials responsible for developing, in cooperation with the state, transportation plans and programs that provide for the development of transportation facilities that will function as an intermodal transportation system, and coordinating transportation planning in a metropolitan area containing 50,000 or more residents.

Mobility - The degree to which the demand for the movement of people and goods can be satisfied. Mobility is measured in Florida by the quantity, quality, accessibility and utilization of transportation facilities and services.

Mode - Any one of the following means of moving people or goods: aviation, bicycle, highway, paratransit, pedestrian, pipeline, rail (commuter, intercity passenger and freight), transit, space and water.

Multimodal Transportation - More than one mode to serve transportation needs in a given area.

National Ambient Air Quality Standards - Federal air quality standards established pursuant to section 109 of the Clean Air Act that apply to ambient air quality designed to protect public health. Included are standards for carbon monoxide (CO), lead (Pb), nitrogen dioxide (NO₂), ozone (O₃), particulate matter (PM-10), and sulphur dioxide (SO₂).

Natural Environment - The surroundings not made by humans within which the transportation system operates. This includes both physical and ecological aspects, including traditional cultural resources.

Paratransit - Forms of transportation service that are more flexible and personalized than conventional fixed route, fixed schedule service; often utilized to accommodate the elderly and disabled passengers unable to use the fixed route service.

Partners, Transportation - Those parties with interests in transportation facilities and services including the public, local governments, metropolitan planning organizations, public and private sector users and providers, Native American Nations, the Florida Department of Transportation, and other federal and state agencies.

Percent of Standard - When used in reference to the Maintenance Program, this refers to the percentage of the acceptable Department standard achieved. For the Maintenance Program, the "maintenance rating" goal is 80, and is based on the Department's

evaluation of its performance using the Maintenance Rating Program. If the Department achieves a rating of 80, this is reported as achieving 100% of the standard.

Preservation - Actions taken to protect existing natural and human environments, investments and mobility options.

P&RP Program & Resource Plan - A 10-year plan that establishes financial and production targets for Florida Department of Transportation programs, thereby guiding program funding decisions to carry out the goals and objectives of the FTP.

Quality of Life – All the characteristics of an area’s living conditions, including such things as housing, education, transportation infrastructure, leisure time offerings, employment opportunities, medical and health care and environmental resources.

Resurfacing Program - Provides for pavement resurfacing, rehabilitation, minor reconstruction, and pavement milling and recycling. Such projects are intended to preserve the structural integrity of highway pavements.

Safety Management System - A systematic process that has the goal of reducing the number and severity of traffic crashes by ensuring that all opportunities to improve highway safety are identified, considered, implemented as appropriate and evaluated in all phases of highway planning, design, construction, maintenance and operation; and by providing information for selecting and implementing effective highway safety strategies and projects.

Safety Program - Includes projects designed to improve vehicle and pedestrian safety on the city, county and state highway systems. The safety program is divided into three subprograms - rail/highway crossings, highway safety and traffic safety grants.

Short-Range Component - An annual report that documents the strategic goals, short-range objectives and strategies necessary for the Department to work with Partners to implement the long range goals and objectives in the Florida Transportation Plan. It addresses periods of up to 10 years. It also serves as the Department’s annual performance report that evaluates how well the Department meets the short-range objectives.

Short-Range Objectives - One or more statements of the specific, measurable, intermediate end that is achievable and marks progress toward a goal and long range objective. Specific objectives may be associated with more than one goal or long range objective. As used in the Short-Range Component, these are short range (5-10 years) objectives for the Florida Department of Transportation to assist its partners in carrying out Florida’s long range goals and objectives identified in the Florida Transportation Plan long range component.

Southeast Florida Rail Corridor - An operating rail corridor owned by the Department. It extends from north of West Palm Beach to Miami. Maintenance and corridor operations are performed by CSX under contract to the Department. Tri-Rail, Amtrak and CSX freight all operate on this Corridor.

- SHS** State Highway System - A network of approximately 12,000 miles of highways owned and maintained by the state or state-created authorities. Major elements include the Interstate, Florida's Turnpike and other toll facilities operated by transportation authorities, and arterial highways.
- SIP** State Implementation Plan - The plan developed by the state and approved by U.S. Environmental Protection Agency that contains the strategies and mechanisms, enforceable under state law, necessary to meet the national ambient air quality standards and comply with federal and state air quality laws and regulations.
- SIS** Strategic Intermodal System - A transportation system comprised of corridors, facilities and services of statewide and inter-regional significance, including appropriate components of every transportation mode, including appropriate bicycle and pedestrian accommodations.
- SRPP** Strategic Regional Policy Plan - The plan required by section 186.507, Florida Statutes, to be developed by each of Florida's 11 Regional Planning Councils that serves as the regional long-range guide for the physical, economic, and social development of the comprehensive planning district, and identifies regional goals and policies. The SRPP subject areas include affordable housing, economic development, emergency preparedness, natural resources of regional significance and regional transportation. The statutory requirement is implemented by Rule Chapter 27E-5, FAC.

Strategy - A specific activity that is designed to help achieve an objective.

Superpave - An asphalt mixture designed to resist the rutting and fatigue cracking caused by heavy loads and extreme temperatures, as experienced with the previous standard (known as the Marshall mix).

Sustainability - Meeting the needs of the present without compromising the ability to meet the needs of the future.

Transit - Mass transportation by bus, rail or other conveyance that provides general or special services to the public on a regular and continuing basis. It does not include school buses or charter or sightseeing services.

Transportation Corridor - Any land area designated by the state, a county or a municipality which is between two geographic points and which area is used or is suitable for the movement of people and goods by one or more modes of transportation, including areas necessary for management of access and securing applicable approvals and permits. Transportation corridors shall contain, but are not limited to, the following: a) existing publicly owned rights-of-way; b) all property or property interests necessary for future transportation facilities, including rights of access, air, view and light, whether public or private, for the purpose of securing and utilizing future transportation right-of-way, including but not limited to, any lands reasonably necessary now or in the future for securing applicable approvals and permits, borrow pits, drainage ditches, water retention areas, rest areas, replacement access for landowners whose access could be

impaired due to the construction of a future facility, and replacement right-of-way for relocation of rail and utility facilities.

Transportation Disadvantaged - Those persons who, because of disability, income status or age, are unable to transport themselves or to purchase transportation services.

TEA-21 Transportation Equity Act for the 21st Century - This Act, signed as law on June 9, 1998, authorizes federal highway and transit programs for the fiscal years 1998 through 2003. Core federal programs established in the Intermodal Surface Transportation Efficiency Act of 1991 (ISTEA) are continued in TEA-21.

TMA Transportation Management Association – An organization which helps solve transportation problems by encouraging businesses and governments to implement ridesharing and demand management strategies.

Tri-Rail - A commuter rail system in Southeast Florida operated by the Tri-County Commuter Rail Authority between West Palm Beach and Miami.

Urban Sprawl - Scattered, untimely and poorly planned urban development that occurs in urban fringe and rural areas. It frequently invades land important for environmental and natural resource protection. Sprawl is typically manifested by one or more of the following patterns: leapfrog development; ribbon or strip development; or large expanses of low-density development of one type, such as single family homes.

VMT Vehicle Miles Traveled - On highways, a measurement of the total miles traveled in a given area for a specified time period. It is calculated by multiplying the number of vehicles by the miles traveled in a given area or on a given highway during the time period. In transit, it is calculated by multiplying the number of vehicles by the miles traveled on a given area or on a different route, line, or network during the time period.

Vehicle Occupancy - The number of persons, including driver and passenger(s) in a vehicle; also includes persons who did not complete a whole trip. Nationwide Personal Transportation Survey vehicle occupancy rates are calculated as person miles divided by vehicle miles.

Vision - A description of the future physical appearance and qualities of a community.

Wetland and Wildlife Conservation Banks – Large land areas purchased for wetland and wildlife conservation to mitigate transportation impacts on a regional basis.

Work Program - The five-year listing of all transportation projects planned for each fiscal year by the Florida Department of Transportation, as adjusted for the legislatively approved budget for the first year of the program.